## Volume 2 INSTRUCTION MANUAL

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Page iv Add Substitute phrase	Table of contents  4.2.2 Interpretation of "highly improbable" Accepted and rejected sequences for the selection of underlying cause of death for mortality statistics	MRG 1130	October 2007	Minor	January 2010
Page vi Add contents reference to new section in Volume 2	5a. Recommendations 138a	MRG 0113	October 2002	Major	January 2006
Page 23  Revise text	3.1.3 Two codes for certain conditions  The "dagger and asterisk" system   While the dagger and asterisk system provides alternative classifications for the presentation of statistics, it is a principle of the ICD that the dagger code is the primary code and must always be used. Provision should be made for the asterisk code to be used in addition if the alternative method of presentation may also be required. For coding, the asterisk code must never be used alone. However, for morbidity coding, the dagger and asterisk sequence may be reversed when the manifestation of a disease is the primary focus of care. Statistics incorporating the dagger codes conform with the traditional classification for presenting data on mortality and morbidity and other aspects of medical care.	MbRG 1237	January 2008	Major	January 2010
Revise text: page 25	3.1.3 Two codes for certain conditions  (iii) If neither the symbol nor the alternative code appears in the title, the rubric as a whole is not subject to dual classification but individual inclusion terms may be; if so, these terms will be marked with the symbol and their alternative codes given, e.g.  A54.8 Other gonococcal infections  Gonococcal:   • peritonitis† (K67.1*)  • pneumonia† (J17.0*)  • septicaemia sepsis	MbRG 1238	October 2007	Major	January 2010

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	• skin lesions				
Modify p. 30  Revise code	"Not elsewhere classified" The words "not elsewhere classified", when used in a three-character category title, serve as a warning that certain specified variants of the listed conditions may appear in other parts of the classification. For example:  J16 Pneumonia due to other infectious organisms, not elsewhere classified This category includes J16.0 Chlamydial pneumonia and J16.8 Pneumonia due to other specified infectious organisms. Many other categories are provided in Chapter X (for example, J09 J10-J15) and other chapters (for example, P23 Congenital pneumonia) for pneumonias due to specified infectious	URC (Proposed and ratified at meeting in Tokyo Oct'05)	October 2005	Major	October 2005
Page 26	organisms. J18 Pneumonia, organism unspecified, accommodates pneumonias for which the infectious agent is not stated.  3.1.5 Categories with common characteristics	WHO	October 1997		January 1999
Revise code	Categories limited to one sex  The following categories apply only to females: A34, B37.3Z32-36, Z39, Z43.7, Z87.5, Z97.5.				j
Page 32  Add text	4.1.3 International form of medical certificate of cause of death  Part I of the form is for diseases related to the train of events leading directly to death, and Part II is for unrelated but contributory conditions.  The medical practitioner or other qualified certifier should use his or her clinical judgment in completing the medical certificate of cause of death.	MRG 0106	October 2001	Major	January 2003
	Automated systems must not include lists or other prompts to guide the certifier as these necessarily limit the range of diagnoses and therefore have an adverse effect on the accuracy and usefulness of the report.				
Page 36	4.1.4 Procedures for selection of the underlying cause of death for mortality tabulation	MRG 1498	October 2010	Minor	January 2012
Add text	When only one cause of death is reported, this cause is used for tabulation by				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	application of the one cause rule.				
	4.1.4 Procedures for selection of the underlying cause of death for mortality tabulation	MRG 1797	October 2011	Minor	January 2013
Revise text	The next step therefore is to determine whether one or more of the modification rules A to <u>D</u> F (see section				
Insert a paragraph	4.1.5 Rules for selection of the originating antecedent cause Sequence	MRG 1472	October 2010	Minor	January 2012
	Hypertension (leading to) cerebrovascular accident (leading to) coma;				
Add text	If the death certificate has more than one sequence it is important to identify the originating cause of the first mentioned sequence. Otherwise, the selection and modification rules cannot be applied properly and the underlying cause will not be correctly selected.				
	To identify the originating cause of the first mentioned sequence, begin with the direct cause of death (the first mentioned condition on the highest used line in Part I). Establish whether the first condition listed on the next line in Part I can cause the direct cause of death. If it cannot, establish if the second condition listed on this line can cause the direct cause of death. Continue until a condition has been found that could cause the direct cause of death. This condition is referred to in the following as the "temporary originating cause". If no condition is found that can cause the direct cause of death, there is no sequence ending with the direct cause of death.				
	If a temporary originating cause has been found but there are conditions reported on lower lines in Part I, repeat the procedure for the next line. Now start with the temporary originating cause identified in the previous step.  Establish whether the first condition listed on the next lower line in Part I can cause the temporary originating cause. If it cannot, establish if the second condition listed on that line can cause the temporary originating cause.				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	Continue until a condition has been found that could cause the temporary originating cause. This is the new temporary originating cause.				
	If a new temporary originating cause has been found but there are still conditions reported on lower lines in Part I, repeat the procedure for as long as a new temporary originating cause can be identified. When no condition can be found that could cause the temporary originating cause, the last identified temporary originating cause is also the originating cause of the first mentioned sequence.				
	The following illustrate examples of competing sequences. The underlying cause of the first mentioned sequence is in grey with a bold black circle.				
Page 35	4.1.6 Some considerations on selection rules	MRG 0104	October 2001	Minor	January 2003
Add Add Add	Example 5: I (a) Generalized metastases 5 weeks (b) Bronchopneumonia 3 days (c) Lung cancer 11 months				
	4.1.7 Examples of the General Principle and selection rules	Australia 0301	October 2005	Major	January 2010

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	General Principle				
	When more than one condition is entered on the certificate, select the condition entered alone on the lowest used line of Part I only if it could have given rise to all the conditions entered above it.				
	Example 8: I (a) Cerebral haemorrhage (b) Hypertension (c) Chronic pyelonephritis (d) Prostatic adenoma				
Revise code	Select prostatic adenoma (N40D29.1).				
Page 39 Change existing text as indicated	4.1.7 Examples of the General Principle and selection rules  Rule 3	MRG 0156	October 2003	Minor	January 2005
marcuted					
	Assumed direct consequences of another condition				
	Any disease Diseases described or qualified as "embolic" may be assumed to be a direct consequence of venous thrombosis, phlebitis or thrombophlebitis, valvular heart disease, atrial fibrillation, childbirth and or any operation. However, there must be a clear route from the place where the thrombus formed and the place of the embolism. Thus, venous thrombosis or thrombophlebitis may cause pulmonary embolism. Thrombi that form in the left side of the heart (for example on mitral or aortic valves), or are due to atrial fibrillations, may cause embolism to the arteries of the body circulation. Similarly, thrombi that form around the right side heart valves (tricuspid and pulmonary valves) may give rise to embolism in the pulmonary arteries. Also, thrombi that form in the left side of the heart could pass to the right side if a cardiac septal defect is present.  Note: Then follows new text from URC:0188 (see below)				
Page 39		MRG	October 2003	Minor	January 2005
1 450 37	4.1.7 Examples of the General Principle and selection rules	0175	Get0001 2003	Willion	January 2003
Add text	Rule 3				
	Assumed direct consequences of another condition				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	Any disease described or qualified as "embolic" may be assumed				
	Dementia, without a mention of specified cause, should be considered a consequence of conditions that typically involve irreversible brain damage.  However, when a specified cause is given, only a condition that <b>may</b> lead to irreversible brain damage should be accepted as cause of the dementia, even if irreversible brain damage is not a typical feature of the condition.				
	Any disease described as secondary should be assumed to be				
Page 39	4.1.7 Examples of the General Principle and selection rules	MRG 0169	October 2003	Minor	January 2005
Add text	Rule 3 Assumed direct consequences of another condition				
	Secondary or unspecified anaemia, malnutrition, marasmus or cachexia may be assumed to be a consequence of any malignant neoplasm, paralytic disease, or disease which limits the ability to care for oneself, including dementia and				
	degenerative diseases of the nervous system.				
Page 39	4.1.7 Examples of the General Principle and selection rules	MRG 0188	October 2003	Minor	January 2005
Delete text	Rule 3				
	Assumed direct consequences of another condition				
Add text	Any disease described or qualified as "embolic" may be assumed to be a direct consequence of venous thrombosis, phlebitis or thrombophlebitis, valvular heart disease, atrial fibrillation, childbirth or any operation.				
	Also, thrombi that form in the left side of the heart could pass to the right side if a cardiac septal defect is present. (From URC:0156, see above)				
	Arterial embolism in the systemic circulation should be considered an obvious consequence of atrial fibrillation. When pulmonary embolism is reported due to atrial fibrillation, the sequence should be accepted. However, pulmonary				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	embolism should not be considered an obvious consequence of atrial fibrillation.				
	Any disease described as secondary should be assumed to be a direct consequence of the most probable primary cause entered on the certificate.				
Page 39	4.1.7 Examples of the General Principle and selection rules	MRG 0047	October 2000	Major	January 2003
	Rule 3 Assumed direct consequences of another condition				
Replace existing 4 <sup>th</sup> paragraph with this revised rule	Assumed direct consequences of another condition				
	Any pneumonia in J12-J18 should be considered an obvious consequence of conditions that impair the immune system. Pneumonia in J18.0 and J18.2-J18.9 should be considered an obvious consequence of wasting diseases (such as malignant neoplasm and malnutrition) and diseases causing paralysis (such				
	as cerebral haemorrhage or thrombosis), as well as serious respiratory conditions, communicable diseases, and serious injuries. Pneumonia in J18.0 and J18.2-J18.9, J69.0, and J69.8 should also be considered an obvious				
	consequence of conditions that affect the process of swallowing. Note: A list of conditions is available from the World Health Organization.				
Page 39	4.1.7 Examples of the General Principle and selection rules	MRG 0213	October 2004	Major	January 2006
Add text	Rule 3 Assumed direct consequences of another condition				
	Lobar pneumonia, unspecified (J18.1) should be considered an obvious consequence of dependence syndrome due to use of alcohol (F10.2). Any				
	pneumonia in J12-J18 should be considered an obvious consequence of conditions that impair the immune system. Pneumonia in J18.0 and J18.2-J18.9 should be considered an obvious consequence of wasting diseases (such				
	as malignant neoplasm and malnutrition) and diseases causing paralysis (such as cerebral haemorrhage or thrombosis), as well as serious respiratory				

Instruction	Instruc	ction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	and J18.2-J18.9, J69.0, and J69.8	ses, and serious injuries. Pneumoni B should also be considered an obvi ffect the process of swallowing. No ne World Health Organization.	ous			
Volume 2, p. 39 (including sentence added in 2004 MRG recommendation concerning alcohol dependence)	consequence of alcohol depende should be considered an obvious immune system. Pneumonia in J obvious consequence of wasting malnutrition) and diseases causing thrombosis), as well as serious reand serious injuries. Pneumonia J18.0 and J18.2-J18.9, J69.0, and consequence of conditions that a common secondary conditions (sand cystitis) should be considered (such as malignant neoplasm and (such as cerebral haemorrhage of diseases, and serious injuries. H	Tanother condition  [18.1] should be considered an obvence (F10.2). Any pneumonia in J1 consequence of conditions that im 18.0 and J18.2-J18.9 should be condiseases (such as malignant neoplar paralysis (such as cerebral haem espiratory conditions, communicabin 1569.8 should also be considered a ffect the process of swallowing. Of such as pulmonary embolism, decurd an obvious consequence of wasting thrombosis) as well as communicating thrombosis) as well as communicating owever, such secondary conditions. Note World Health Organization.	2-J18 pair the sidered an asm and orrhage or le diseases, n obvious ther bitus ulcer, ng diseases g paralysis able should not	October 2004	Minor	January 2006
'wasting and paralyzing obvious consequences of		ies flagged with an 'M' (Maybe) sl g and paralyzing diseases' list only	nould be considered			
<u>,                                      </u>	<u>'</u>	8				

Instructio	on Instr	uction manual e	entries	So	urce	Date approved	Major/ Minor update	Implementati on date
I26.0- I26.9	<u>Pulmonary embolism</u>							
<u>I74.2-I74.4</u>	Arterial embolism and thrombosis of							
	extremities							
I80.1-I80.3	Phlebitis and thrombophlebitis of lower							
	extremities							
I80.9	Phlebitis and thrombophlebitis of							
	unspecified site							
I82.9	Embolism and thrombosis of							
	unspecified vein							
K55.0	Acute vascular disorder of intestine	M	The condition in K55.0 must be					
			specified as an embolism					
K56.4	Other impaction of intestine							
K59.0	Constipation							
L89	Decubitus ulcer							
N10-N12	Tubulo-interstitial nephritis	<u>M</u>	Diseases causing paralysis or inab	ility				
1110 1112	Tuo uro mersutati nepintas	111	to control bladder	<u> </u>				
N28.0	Ischaemia and infarction of kidney	M	The condition in N28.0 must be					
1,20,0	isomorma and marvada of money	<u> </u>	specified as an embolism of the re-	nal				
			artery	1141				
N30.0-N30.2	Cystitis, acute, interstitial and other	<u>M</u>	Diseases causing paralysis or inab	ility				
110010 110012	chronic		to control bladder	<u> </u>				
N30.9	Cystitis, unspecified	<u>M</u>	Diseases causing paralysis or inab	ility				
	<u></u>		to control bladder					
N31	Neuromuscular dysfunction of bladder,							
1,01	not elsewhere classified							
N34.0-N34.2	Urethritis	<u>M</u>	Diseases causing paralysis or inab	ility				
110 110 110 112	<u></u>		to control bladder	<u> </u>				
N35.1-N35.9	Urethral stricture	<u>M</u>	Diseases causing paralysis or inab	ility				
		===	to control bladder					
N39.0	Urinary tract infection, site not	<u>M</u>	Diseases causing paralysis or inab	ility				
1,05,0	specified	<u> </u>	to control bladder	<u> </u>				
L	1 200	<u>I</u>	20 COMMON DIMMENT		I			
20	Contain mantanametra a constitue (		) haamamhaaa		MRG	October 2005	Minor	T
p. 39	Certain postoperative complications (pner	лиоша (апу турс	e), naemornage		0348	October 2005	winor	January 2007
Add text	Heart failure (I50) and unspecified heart	disassa (IS1 0)	should be considered an		U348			2007
Aud text	obvious consequence of other heart condi		snould be considered an					
	obvious consequence of other heart condi	uons.						

Instruct	ion Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	Pulmonary edema (J81) should be considered an obvious consequence of heart disease (including pulmonary heart disease); of conditions affecting the lung parenchyma, such as lung infections, aspiration and inhalation, respiratory distress syndrome, high altitude, and circulating toxins; of conditions causing fluid overload, such as renal failure and hypoalbuminemia; and of congenital anomalies affecting the pulmonary circulation, such as congenital stenosis of pulmonary veins. Note: a list of conditions can be obtained from the WHO Web site.				
	Lobar pneumonia, unspecified (J18.1) should be considered an obvious consequence of dependence syndrome due to use of alcohol (F10.2). Any pneumonia in J12-J18 should be considered an obvious consequence of conditions that impair the immune system				
p. 39 Add text	4.1.7 Examples of the General Principle and selection rules  Rule 3	MRG 0347	October 2005	Minor	January 2007
	Assumed direct consequences of another condition				
	Any pneumonia in J12-J18 should be considered an obvious consequence of conditions that impair the immune system. Pneumonia in J15.0-15.6, J15.8-J15.9, J16.8, J18.0 and J18.2-J18.9 should be considered an obvious consequence of wasting diseases (such as malignant neoplasm and malnutrition) and diseases causing paralysis (such as cerebral haemorrhage or thrombosis), as well as serious respiratory conditions, communicable diseases, and serious injuries. Pneumonia in J15.0-15.6, J15.8-J15.9, J16.8, J18.0, J18.2-J18.9, J69.0, and J69.8 should also be considered an obvious consequence of conditions that affect the process of swallowing.				
Page 40	4.1.7 Examples of the General Principle and selection rules	MRG 0189	October 2003	Minor	January 2005
Add text	Rule 3  Assumed direct consequences of another condition  Nephritic syndrome may be assumed to be a consequence of any streptococcal infection (scarlet fever, streptococcal sore throat, etc). Acute renal failure should be assumed as an obvious consequence of a urinary tract infection, provided that there is no indication that the renal failure was present before the urinary tract infection.				

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Page 40	4.1.7 Examples of the General Principle and selection rules  Rule 3	MRG 0262	October 2004	Minor	January 2006
Add text	Assumed direct consequences of another condition  An operation on a given organ should be considered a direct consequence of any surgical condition (such as malignant tumour or injury) of the same organ reported anywhere on the certificate.  Haemorrhage should be considered an obvious consequence of anticoagulant poisoning or overdose. However, haemorrhage should not be considered an obvious consequence of anticoagulant therapy without mention of poisoning or overdose.				
Page 42  Revise text:	4.1.7 Examples of the General Principle and selection rules  Rule 3  Assumed direct consequences of another condition  Certain postoperative complications (pneumonia (any type), haemorrhage, thrombophlebitis, embolism, thrombosis, septicaemia sepsis, cardiac arrest, renal failure (acute), aspiration, atelectasis and infarction) should be considered direct consequences of an operation, unless surgery was carried out four weeks or more before death.	MbRG 1238	October 2007	Major	January 2010
Page 43  Add text:	4.1.7 Examples of the General Principle and selection rules  Rule 3  Assumed direct consequences of another condition  Dehydration may be should be considered assumed to be a an obvious consequence of any intestinal infectious disease.	MRG 1122	October 2007	Minor	January 2009
	Primary atelectasis of newborn (P28.0) should be considered an obvious consequence of congenital kidney conditions (Q60, Q61.0-Q61.1, Q61.3-Q61.9, Q62.1, Q62.3, Q62.4).				

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	premature rupture of membranes (P01.1), and oligohydramnios (P01.2).  Fetus and newborn affected by premature rupture of membranes or oligohydramnios (P01.1-P01.2) should be assumed to be a direct consequence of congenital kidney conditions (Q60, Q61.0-Q61.1, Q61.3-Q61.9, Q62.1, Q62.3, Q62.4).				
Page 43 Add text:	4.1.7 Examples of the General Principle and selection rules  Rule 3	MRG 1142	October 2007	Major	January 2010
Add text:	Acidosis (E87.2); Other specified metabolic disorders (E88.8); Other mononeuropathies (G58); Polyneuropathy, unspecified (G62.9); Other disorders of peripheral nervous system (G64); amyotrophy not otherwise specified in Other primary disorders of muscles (G71.8), Disorder of autonomic nervous system, unspecified (G90.9), and Neuralgia and neuritis, unspecified (M79.2); Iridocyclitis (H20.9); Cataract, unspecified (H26.9); Chorioretinal inflammation, unspecified (H30.9); Retinal vascular occlusions (H34); Background retinopathy and retinal vascular changes (H35.0); Other proliferative retinopathy (H35.2); Retinal haemorrhage (H35.6); Retinal disorder, unspecified (H35.9); Peripheral vascular disease, unspecified (I73.9); Atherosclerosis of arteries of extremities (I70.2); Arthritis, unspecified (M13.9); Nephrotic syndrome (N03- N05); End stage renal disease (N18.0); Chronic renal failure, Chronic kidney disease, unspecified (N18.9 N18)); Unspecified renal-kidney failure (N19); Unspecified contracted kidney (N26); renal disease in Disorder of kidney and ureter, unspecified (N28.9) and Persistent proteinuria, unspecified (N39.1); Gangrene, not elsewhere classified (R02); Coma, unspecified (R40.2); and Other specified abnormal findings of blood chemistry (R79.8) for acetonemia, azotemia, and related conditions should be considered an obvious consequence of Diabetes mellitus (E10-E14).				
Added codes to table	4.1.7 Examples of the General Principle and selection rules  Rule 3	MRG 1127	October 2007	Minor	January 2009
	Assumed direct consequences of another condition  Conditions in the following categories should be considered obvious consequences of the conditions listed in the "wasting and paralyzing diseases" list. Conditions in categories				

Instruction	1	:	Instruction n	nanual entries	Source	Date approved	Major/ Minor update	Implementati on date
	conditions		d paralyzing d	ed obvious consequences of the iseases" list only if they meet a column of the table.				
	Code(s)		Conditional Response	Qualifier				
	E86	Volume depletion						
	G81-G83	Other paralytic syndromes						
I I	I26.0- I26.9	Pulmonary embolism						
I I	1	Arterial embolism and thrombosis of extremities						
		Phlebitis and thrombophlebitis of lower extremities						
		Phlebitis and thrombophlebitis of unspecified site						
	182.9	Embolism and thrombosis of unspecified vein						
	K55.0	Acute vascular disorder of intestine	M	The condition in <b>K55.0</b> must be specified as an embolism				
		Other impaction of intestine						
	K59.0	Constipation						
	L89	Decubitus ulcer						
		Tubulo-interstitial nephritis	M	Diseases causing paralysis or inability to control bladder				
		Renal failure Kidney disease, acute or unspecified						
	N28.0	Ischaemia and	M	The condition in <b>N28.0</b> must				

Instructi	on		Instructio	n manual entries		Source	Date approved	Major/ Minor update	Implementati on date
		infarction of kidney		be specified as an embolism of the renal artery					
	N30.0- N30.2	Cystitis, acute, interstitial and other chronic	M	Diseases causing paralysis or inability to control bladder					
	N30.9	Cystitis, unspecified	M	Diseases causing paralysis or inability to control bladder					
	N31	Neuromuscular dysfunction of bladder, not elsewhere classified							
	N34.0- N34.2	Urethritis	M	Diseases causing paralysis or inability to control bladder					
	N35.1- N35.9	Urethral stricture (non-traumatic)	M	Diseases causing paralysis or inability to control bladder					
	N39.0	Urinary tract infection, site not specified	M	Diseases causing paralysis or inability to control bladder					
	just the second				_				
Page 43	4.1.7 Exa	mples of the General Pri	nciple and	l selection rules		MRG 1249	October 200	8 Minor	January 2010
	Rule 3 Assumed	direct consequences of and	other cond	ition		1217			2010
Add text									
	or overdo anticoagu should be	se. However, haemorrhage lant therapy without menti	e should no on of pois	s consequence of anticoagulant poisoning the considered an obvious consequence oning or overdose. Gastric haemorrhage of steroid, aspirin, and nonsteroidal anti-	of				

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	4.1.7 Examples of the General Principle and selection rules  Rule 3	MRG 1036	October 2006	Minor	January 2008
	Assumed direct consequences of another condition				
Add text p. 43	Lobar pneumonia, unspecified (J18.1) should be considered an obvious consequence of dependence syndrome due to use of alcohol (F10.2). Any pneumonia in J12-J18 should be considered an obvious consequence of conditions that impair the immune system. Pneumonia in J18.0 and J18.2-J18.9 should be considered an obvious consequence of wasting diseases (such as malignant neoplasm and malnutrition) and diseases causing paralysis (such as cerebral haemorrhage or thrombosis), as well as serious respiratory conditions, communicable diseases, and serious injuries. Pneumonia in J18.0 and J18.2-J18.9, J69.0, and J69.8 should also be considered an obvious consequence of conditions that affect the process of swallowing. Pneumonia in J18 (except lobar pneumia) reported with immobility or reduced mobility should be coded to J18.2. Other common secondary conditions (such as pulmonary embolism, decubitus ulcer, and cystitis) should be considered an obvious consequence of wasting diseases (such as malignant neoplasms and malnutrition) and diseases causing paralysis (such as cerebral haemorrhage or thrombosis) as well as communicable diseases, and serious injuries. However, such secondary conditions should not be considered an obvious consequence of respiratory conditions.				
Page 43	4.1.7 Examples of the General Principle and selection rules  Rule 3	MRG 1471	October 2008	Minor	January 2010
	Assumed direct consequences of another condition  Haemorrhage should be considered mentioning of poisoning or overdose.				
Add text	Mental retardation should be considered an obvious consequence of perinatal conditions in P00-P04 (Fetus and newborn affected by maternal factors and by complications of pregnancy, labour and delivery), P05 (Slow fetal growth and fetal malnutrition), P07 (Disorders related to short gestation and low birth weight, not elsewhere classified), P10 (Intracranial laceration and haemorrhage due to birth injury), P11.0 (Cerebral oedema due to birth injury), P11.1 (Other specified brain damage due to birth injury), P11.2 (Unspecified brain damage due to birth injury), P11.9 (Birth injury to central nervous system, unspecified), P15.9 (Birth injury, unspecified), P20 (Intrauterine hypoxia), P21				

Instructi	n Instruction manual entries	Source I	Date approved	Major/ Minor update	Implementati on date
	(Birth asphyxia), P35 (Congenital viral diseases), P37 (Other congenital infectious and parasitic diseases), P52 (Intracranial nontraumatic haemorrhage of fetus and newborn), P57 (Kernicterus), P90 (Convulsions of newborn) and P91 (Other disturbances of cerebral status of newborn).]				
Revise text	4.1.7 Examples of the General Principle and selection rules Rule 3 Assumed direct consequences of another condition Any infectious diseases  Certain conditions should be considered direct consequences of a medical procedure, if the procedure was carried out within four weeks before death. A list of such complications can be found in Appendix @@.  Appendix @@: List of conditions to be considered direct consequences of medical procedures	MRG 1553	October 2009	Minor	January 2011
	<ul> <li>A condition on the list should be considered a direct consequence of a medical procedure if the procedure was carried out within four weeks before death.</li> <li>No condition on the list should be considered a direct consequence of a procedure if there is evidence that the condition was present before the procedure was carried out.</li> <li>A condition flagged with "OCPR" (Other Cause of Procedure Required) should be considered an obvious consequence of a procedure only if another reason for performing the procedure is indicated on the certificate.</li> <li>A condition flagged with "DSAP" (Duration Stated, developed After Procedure) should be considered an obvious consequence of a medical procedure only if there is clear evidence that the condition developed after the procedure.</li> <li>Adhesions should be considered an obvious consequence of a procedure in the same site or region, even after more than four weeks. If the procedure was performed more than one year before death, use the codes for sequelae of medical care.</li> </ul>				

Instruction	n Instruction manual entries	Source Da	te approved	Major/ Minor update	mplementati on date
	Infections  abscess bacteraemia fistula OCPR OCPR OCPR, and for a procedure of				
	the same site or region  only gas gangrene infection, haemolytic infection NOS DSAP infection in surgical wound septicaemia septic  Haemorrhage, haemolysis				
	coagulopathy, consumption  DIC (disseminated intravascular coagulation)  haemorrhage NOS  haemorrhage, gastrointestinal  haemorrhage, intraabdominal  haemorrhage, rectal  haemorrhage, surgical wound  haemorrhage, specified site  OCPR  haemorrhage, surgical wound  haemorrhage, specified site  for a  procedure of  the same site  or region				
	haematemesis haematoma haemothorax haemolysis melaena  OCPR OCPR OCPR  OCPR  OCPR  Address OCPR  OCPR  Address OCPR  OCPR				

Instruction	Instruction manual entries	Source Da	ate approved	Major/ Minor update	mplementati on date
	arrest, cardiac arrhythmia NOS asystole block, cardiac fibrillation, atrial fibrillation, ventricular infarction (myocardial) ischaemia, myocardial  Cerebrovascular and other cerebral complications  DSAP  DSAP  DSAP  DSAP				
	damage, brain (anoxic) embolism, cerebral haemorrhage, cerebral/intracranial infarction, cerebral ischaemia, cerebral/cerebrovascular lesion, cerebral/cerebrovascular meningitis oedema, cerebral stroke thrombosis, cerebral  DSAP DSAP DSAP DSAP DSAP DSAP DSAP DSA				
	Other vascular complications  arrest, circulatory embolism (arterial) embolism, fat/air embolism, pulmonary embolism, venous failure/insufficiency, circulatory hypotension infarction, pulmonary infarction (any site) occlusion (any site) phlebitis (any site)				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
phlebothrombosis (any site)				Ì	
thrombophlebitis (any site)					
thrombosis, arterial					
thrombosis, venous thrombosis NOS (any site)					
unombosis NOS (any site)					
Respiratory complications					
alkalosis and acidosis, respirato	<u>ory</u>				
ARDS (adult respiratory distres	ss syndrome)				
arrest, respiratory					
aspiration					
<u>atelectasis</u> <u>bronchitis</u>	DSAP				
effusion, pleura	<u>DSAI</u>				
empyema	<u>OCPR</u>				
fistula, bronchopleural or oesog					
failure/insufficiency, pulmonar					
failure/insufficiency, respirator	<u>y</u>				
<u>mediastinitis</u>	OCIND				
obstruction, upper airway oedema, laryngeal	<u>OCPR</u> OCPR				
oedema/hypostasis, pulmonary					
pneumonia					
pneumothorax	<u>OCPR</u>				
<u> </u>	<del></del>				
Gastrointestinal complications					
	O CIND				
abscess, intra-abdominal	<u>OCPR</u> OCPR				
constipation dilatation, gastric	<u>OCPR</u>				
disorder, circulatory, gastrointe					
embolism, mesenterial	OCPR				
failure, hepatic	DSAP				
fistula, biliary/ bowel/rectovagi	inal OCPR				
ileus	<u>OCPR</u>				
ischaemia, intestinal	<u>OCPR</u>				
necrosis, gastrointestinal	OCPR OCPR				
obstruction, bowel (mechanical	<u>OCPR</u>				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
<u>peritonitis</u> <u>ulcer, gastrointestinal (stres</u>	ocpr ocpr				
volvulus	OCPR OCPR				
Renal and urinary complice	<u>ations</u>				
<u>anuria</u> <u>failure/insufficiency, renal</u>					
<u>fistula, urinary</u>	<u>OCPR</u>				
<u>infection, urinary</u> <u>pyelonephritis</u>	DSAP				
retention, urine					
stricture, urethra uraemia	<u>OCPR</u>				
urosepsis					
Other complications					
<u>adhesions</u>	<u>for a</u>				
	<u>procedure of</u> the same site				
	or region				
shock NOS	<u>only</u>				
shock, anaphylactic "complication(s)" NOS					
crisis, thyrotoxic	DSAP				
displacement, prosthesis failure, (multi)organ					
gangrene	6 ====				
insufficiency, anastomosis necrosis, fat/wound	<u>OCPR</u> <u>OCPR</u>				
syndrome, compartment	<u>OCPR</u>				
seizures (epileptic) ulcer, decubitus	<u>DSAP</u>				
Page 39 4.1.7 Examples of the	General Principle and selection rules	MRG	October 2010	Minor	January
		1498			2012

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	General Principle			apuare	
Delete text	Example 10: I(a) Bronchopneumonia II — Secondary anaemia and chronic lymphatic leukaemia				
	Select bronchopneumonia. But Rule 3 also applies; see Example 26				
Page 43	4.1.7 Examples of the General Principle and selection rules	MRG 1683	October 2010	Minor	January 2012
Add new text between the paragraphs on	Rule 3				
infectious diseases and certain	Enterocolitis due to <i>Clostridium difficile</i> should be assumed to be an obvious consequence of antibiotic therapy.				
postoperative conditions	Certain postoperative complications				
	4.1.7  Rule 3	MRG 1769	October 2011	Major	January 2013
Revise text	Any infectious disease elassifiable to A09 B19, B25 B49, B58 B64, B99 or J12 J18 aside from those listed in section 4.2.2 A.(a) should be considered to be a direct consequence of reported HIV disease.				
	4.1.7 Examples of the General Principle and selection rules Rule 3	MRG 1792	October 2011	Minor	January 2013
	Arterial embolism in the systemic circulation an obvious consequence of atrial fibrillation				
Add text	<u>Unspecified dementia (F03) and Alzheimer's disease (G30) should be considered an obvious consequence of Down's syndrome (Q90).</u>				
	Section 4.1.7 Rule 3	MRG 1796	October 2011	Minor	January 2013

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	Heart failure (I50) and unspecified heart disease (I51.9) should be considered an obvious consequence of other heart conditions.				
Add text	Oesophageal varices (I85) should be considered an obvious consequence of liver diseases classifiable to B18, K70, K73, K74, and K76				
	4.1.7 Examples of the General Principle and selection rules	MRG 1864	October 2011	Minor	January 2013
	Rule 3 Assumed direct consequences of another condition				
Revise text	Acidosis ( <u>E87.2</u> ); Other specified metabolic disorders ( <u>E88.8</u> ); Other mononeuropathies ( <u>G58</u> ); Polyneuropathy, unspecified ( <u>G62.9</u> ); Other disorders of peripheral nervous system ( <u>G64</u> ); <u>Myoneural disorder, unspecified (G70.9)</u> ; Amyotrophy not otherwise specified in Other primary disorders of muscles ( <u>G71.8</u> ), Disorder of autonomic nervous system, unspecified ( <u>G90.9</u> ), Iridocyclitis, unspecified ( <u>H20.9</u> ); Cataract, unspecified ( <u>H26.9</u> ); Chorioretinal inflammation, unspecified ( <u>H30.9</u> ); Retinal vascular occlusions ( <u>H34</u> ); Background retinopathy and retinal vascular changes ( <u>H35.0</u> ); Other proliferative retinopathy ( <u>H35.2</u> ); Retinal haemorrhage ( <u>H35.6</u> ); Retinal disorder, unspecified ( <u>H35.9</u> ); Paralytic strabismus, unspecified ( <u>H49.9</u> ); Blindness and low vision ( <u>H54</u> ); Atherosclerosis of arteries of extremities ( <u>I70.2</u> ); Peripheral vascular disease, unspecified ( <u>I73.9</u> ); Angiopathy in Other and unspecified disorders of circulatory system ( <u>199</u> ); Dermatitis, unspecified ( <u>L30.9</u> ); Necrobiosis lipoidica, not elsewhere classified ( <u>L92.1</u> ); <u>Ulcer of lower limb, not elsewhere classified (L97); Arthritis, unspecified (M13.9); Neuralgia and neuritis, unspecified (<u>M79.2</u>); Disorder of bone, unspecified (M89.9); Nephrotic syndrome (<u>M03</u>- <u>M05</u>); Chronic kidney disease (<u>M18</u>); Unspecified kidney failure (<u>M19</u>); Unspecified contracted kidney (<u>M26</u>); Renal disease in Disorder of kidney and ureter, unspecified (<u>M28.9</u>); Urinary tract infection site no specified (<u>M39.0</u>); Persistent proteinuria, unspecified (<u>M39.1</u>); Gangrene, not elsewhere classified (<u>R02</u>); Coma, unspecified (<u>R40.2</u>); and Acetonemia, azotemia, and related conditions in Other specified abnormal findings of blood chemistry (<u>R79.8</u>) should be considered an obvious consequence of Diabetes mellitus (<u>E10-E14</u>).</u>				
Revise	4.1.7 Examples of the General Principle and selection rules Rule 3	Korea 1917	October 2012	Minor	January 2014

Includes proposals ratified by the WHO-FIC Network at the annual meeting in Brasilia, October 2012

Instruction	on Instruction manual entries	Source D	ate approved	Major/ Minor update	Implementati on date
example	Example 25: I (a) Cerebral toxoplasmosis and herpes zoster  II (b) Burkitt lymphoma, HIV disease				
Page 42	<b>4.1.8 Modification of the selected cause</b> Some of the modification rules require further application of the selection rules, which will not be difficult for experienced coders, but it is important to go through the process of selection, modification and, if necessary, reselection. After application of the	MRG 0157	October 2003	Minor	January 2005
Add text	modification rules, selection Rule 3 should be reapplied.  4.1.9 The modification rules	MRG	October 1999		January
Page 42	Rule A. Senility and other ill-defined conditions	(URC:0048 – for addition of P28.5)	October 1999		2001
Replace existing paragraph with this revised rule	Where the selected cause is ill-defined and a condition classified elsewhere is reported on the certificate, reselect the cause of death as if the ill-defined condition had not been reported, except to take account of that condition it if modifies the coding. The following conditions are regarded as ill-defined: I46.9 (Cardiac arrest, unspecified); I95.9 Hypotension, unspecified); I99 (Other and unspecified disorders of circulatory system); J96.0 (Acute respiratory failure); J96.9 (Respiratory failure, unspecified); P28.5 (Respiratory failure of newborn); R00-R94 or R96-R99 (Symptoms, signs and abnormal				
	clinical and laboratory findings, not elsewhere classified). Note that R95 (Sudden infant death) is not regarded as ill-defined.				

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Modify p. 42, section	4.1.9 The modification rules	MRG 0316	October 2005	Major	January 2010
4.1.9	Rule A. Senility and other ill-defined conditions	0310			2010
	Where the selected cause is ill-defined and a condition classified elsewhere is reported on the certificate, reselect the cause of death as if the ill-defined condition had not been reported, except to take account of that condition it if modifies the coding. The following conditions are regarded as ill-defined: I46.9 (Cardiac arrest, unspecified); I95.9 Hypotension, unspecified); I99 (Other and unspecified disorders of circulatory system); J96.0 (Acute respiratory failure); J96.9 (Respiratory failure, unspecified); P28.5 (Respiratory failure of newborn); R00-R94 or R96-R99 (Symptoms, signs and abnormal clinical and laboratory findings, not elsewhere classified). Note that R95 (Sudden infant death) is not regarded as ill-defined.  If all other conditions reported on the certificate are ill-defined or trivial, the cause of death should not be reselected. That is, Rule A does not apply.				
Add text	death should not be reselected. That is, Rule A does not appry.				
page 45  Add condition to list of illdefined conditions	4.1.9 The modification rules  Rule A. Senility and other ill-defined conditions  The following conditions are regarded as ill-defined: I46.1 (Sudden cardiac death, so described); I46.9 (Cardiac arrest, unspecified); I95.9 (Hypotension, unspecified);	MRG 1248	October 2008	Minor	January 2010
conditions	described), 140.9 (Cardiac arrest, unspecified), 193.9 (Hypotension, unspecified),				
Page 42	4.1.9 The modification rules	MRG 0114	October 2002	Major	January 2006
Add text	Rule B. Trivial conditions  Where the selected cause is a trivial condition unlikely to cause death and a more serious condition (any condition except an ill-defined or another trivial condition) is reported, reselect the underlying causeof the trivial condition, select the adverse reaction.				
Add text	When a trivial condition is reported as causing any other condition, the trivial condition is not discarded, i.e. Rule B is not applicable.				

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Add text:	4.1.9 The modification rules  Rule B. Trivial conditions  Where the selected cause is a trivial condition unlikely to cause death (see Appendix 7.1) and a more serious condition (any condition except an ill-defined or another trivial condition) is reported, reselect the underlying cause as if the trivial condition had not been reported. If the death was the result of an adverse reaction to treatment of the trivial condition, select the adverse reaction.	MRG 1121	October 2007	Minor	January 2009
Add text to Volume 2, Second Edition, page 46 and Volume 2 (2008), p. 49	<ul> <li>4.1.9 The modification rules</li> <li>Rule C. Linkage</li> <li></li> <li>Where a conflict in linkages occurs, link with the condition that would have been selected if the cause initially selected had not been reported. Make any further linkage that is applicable.</li> <li>Combination codes which express a more specific variety of the condition selected than the originating antecedent cause should be used when available. However, when the combination code is in a different three-character category than the code for the originating antecedent cause, the code for the combination must clearly identify the originating antecedent cause. All possible detail should be retained in the multiple cause coding.</li> </ul>	MRG 1218	October 2010	Minor	January 2012
Delete Rule E	4.1.9 The modification rules  Rule E. Early and late stages of disease  Where the selected cause is an early stage of a disease and a more advanced stage of the same disease is reported on the certificate, code to the more advanced stage. This rule does not apply to a "chronic" form reported as due to an "acute" form unless the classification gives special instructions to that effect.	MRG 1797	October 2011	Minor	January 2013

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Delete Rule F	4.1.9 The modification rules   Rule F. Sequelae  - Where the selected cause is an early forma of a condition for which the classification provides a separate "Sequelae of" category, and there is evidence that death occurred from residual effects of its condition rather than from those of its active phase, code to the appropriate "Sequelae of" category.	MRG 1791	October 2011	Major	January 2013
Modify p.44  Add text	4.1.10 Examples of the modification rules  Rule A. Senility and other ill-defined conditions  Where the selected cause is ill-defined and a condition classified elsewhere is reported on the certificate, reselect the cause of death as if the ill-defined condition had not been reported, except to take account of that condition it if modifies the coding. The following conditions are regarded as ill-defined: I46.9 (Cardiac arrest, unspecified); I95.9  Hypotension, unspecified); I99 (Other and unspecified disorders of circulatory system); J96.0 (Acute respiratory failure); J96.9 (Respiratory failure, unspecified); P28.5  (Respiratory failure of newborn); R00-R94 or R96-R99 (Symptoms, signs and abnormal clinical and laboratory findings, not elsewhere classified). Note that R95 (Sudden infant death) is not regarded as ill-defined.  If all other conditions reported on the certificate are ill-defined or trivial, the cause of death should not be reselected. That is, Rule A does not apply	MRG 0316	October 2005	Major	January 2010
page 45  Add condition to list of ill-defined conditions	4.1.10 Examples of the modification rules  Rule A. Senility and other ill-defined conditions  The following conditions are regarded as ill-defined: I46.1 (Sudden cardiac death, so described); I46.9 (Cardiac arrest, unspecified); I95.9 (Hypotension, unspecified);	MRG 1248	October 2008	Minor	January 2010
Page 48 Change	4.1.10 Examples of the modification rules	MRG 0114	October 2002	Major	January 2006

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
existing text as indicated.	Rule B. Trivial conditions				
Change existing text as	(A) Where the selected cause is a trivial condition unlikely to cause death and a more serious condition (any condition except an ill-defined or another trivial condition) is reported, reselect the underlying cause as if the trivial condition has not been reported. If the death was the result of an adverse reaction to treatment of the trivial condition, select the adverse reaction.				
indicated	Example 38: I (a) Dental caries II Cardiac arrest Diabetes				
Change existing text as	Code to cardiac arrest (I46.9) diabetes (E14.9). Dental caries, selected by the General Principle, is ignored.  Example 39: (no change to existing example)				
indicated	(B) If the death was the result of an adverse reaction to treatment of the trivial condition, select the adverse reaction.				
	Example 40: I (a) Intraoperative haemorrhage (b) Tonsillectomy (c) Hypertrophy of tonsils				
Change existing text as indicated	Code to haemorrhage during surgical operation (Y60.0). Code to the adverse reaction to treatment of the hypertrophy of tonsils, selected by the General Principle.				
	(C) When a trivial condition is reported as causing any other condition, the trivial condition is not discarded (i.e. Rule B is not applicable).				
Change existing text as	Example 41: I (a) Bursitis and ulcerative colitis Septicaemia (b) Impetigo				
indicated	Code to ulcerative colitis (K51.9). Bursitis, selected by Rule 2  Example 20), is ignored.  Code to impetigo (L01.0) The trivial condition selected by the General Principle is not discarded since it is reported as the another condition.				
	Example 42: I (a) Paronychia Respiratory insufficiency				

Instructio	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Change existing text as indicated	H (b) Tetanus Upper respiratory infection  Code to tetanus (A35). Paronychia, selected by the General Principle, is ignored.  Code to upper respiratory infection (J06.9). The trivial condition selected by the General Principle is not discarded since it is reported as the cause of another condition.				
Add text:	4.1.10 Examples of the modification rules  Rule B. Trivial conditions  Where the selected cause is a trivial condition unlikely to cause death (see Appendix 7.1) and a more serious condition (any condition except an ill-defined or another trivial condition) is reported, reselect the underlying cause as if the trivial condition had not been reported. If the death was the result of an adverse reaction to treatment of the trivial condition, select the adverse reaction.	MRG 1121	October 2007	Minor	January 2009
Page 47 Add text	4.1.10 Examples of the modification rules  Rule C. Linkage  Example 55: I (a) Pneumocystis carinii pneumonia (b) HIV Code to B20.6. HIV, selected by the General Principle, links Pneumocystis carinii pneumonia.  Example 56: I (a) Respiratory failure (b) HIV Code to B24. Respiratory failure is an ill-defined condition not link to any of the categories in B20-B23.	MRG 0202	October 2003	Minor	January 2005
Revise text	4.1.10 Examples of the modification rules  Rule C. Linkage  Example 55: I (a) Pneumocystis carinii [jirovecii] pneumonia (b) HIV	Germany 1014		Minor	January 2008

Instruction	n Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	Code to B20.6. HIV, selected by the General Principle, links with Pneumocystis carinii [jirovecii] pneumonia.				
	4.1.10 Examples of the modification rules  Rule C. Linkage	MRG 1218	October 2010	Minor	January 2012
Add text and examples to Volume 2, Second Edition, page 49 and Volume 2 (2008), p. 52	Where a conflict in linkages occurs, link with the condition that would have been selected if the cause initially selected had not been reported. Make any further linkage that is applicable.  Combination codes which express a more specific variety of the condition selected than the originating antecedent cause should be used when available. However, when the combination code is in a different three-character category than the code for the originating antecedent cause, the code for the combination must clearly identify the originating antecedent cause. All possible detail should be retained in the multiple cause coding.				
	Example 43: I (a) Cardiomyopathy (b) Alcoholism  Code alcoholic cardiomyopathy (I42.6)				
Renumber subsequent examples	Example 4344 I (a) Intestinal obstruction (b) Femoral hernia  Code to femoral hernia with obstruction (K41.3).				
	Example 45: I (a) Epileptic attack (b) Chronic alcoholism  Code to chronic alcoholism (F10.2). Special epileptic syndromes are indexed to G40.5, but that combination code does not identify the originating antecedent cause.				

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	4.1.10 Examples of the modification rules	Australia 1241	October 2007	Major	January 2010
Revise code:	Rule D. Specificity  Example 60: I (a) Pericarditis				
	(see Example 14), modifies the pericarditis.  4.1.10 Examples of the modification rules	1470	October 2009	Minor	January
Add text to end of section 4.1.10	Application of Rule 3 following modification	MRG	October 2009	Willion	2011
4.1.10	After application of the modification rules, selection Rule 3 should be reapplied. However, Rule 3 should not be applied if the originating cause selected by application of the modification rules is correctly reported as due to another condition, except when this other condition is ill-defined or trivial.				
	Ex xx:  I(a) Septicemia  (b) Arterial embolism  (c) Circulatory insufficiency  II Malignant neoplasm of colon				
	Code to malignant neoplasm of colon (C18.9). Circulatory insufficiency, selected by the General Principle, is ignored (Rule A Senility and other ill-defined conditions) and arterial embolism is selected as the originating cause. Arterial embolism can be considered a direct consequence of malignant neoplasm of colon (a wasting condition). Rule 3 applies, and malignant neoplasm of colon (C18.9) is selected as underlying cause of death.				
	Ex xx:  I(a) Septicemia (b) Arterial embolism (c) Generalized atherosclerosis II Malignant neoplasm of colon				
	Code to arterial embolism (I74.9). Generalized atherosclerosis, selected by the General Principle, links with arterial embolism (Rule C). Although arterial embolism can be considered a direct consequence of malignant neoplasm of colon (a wasting condition) it				

Delete Rule E	is reported as due to generalized atherosclerosis on this certificate. Rule 3 is, therefore, not applied.  4.1.10 Examples of the modification rules  Rule E. Early and late stages of disease	MRG 1797	October 2011		
Delete Rule E	4.1.10 Examples of the modification rules		October 2011		
Delete Rule E	-		October 2011		
	Rule E. Early and late stages of disease		October 2011	Minor	January
	Where the selected cause is an early stage of a disease and a more advanced stage of the same disease is reported on the certificate, code to the more advanced stage. This rule does not apply to a "chronic" form reported as due to an "acute" form unless the classification gives special instructions to that effect.  Example 63: I (a) Tertiary syphilis  (b) Primary syphilis (A52.9).  Example 64: I (a) Eclampsia during pregnancy  (b) Pre eclampsia  Code to eclampsia during pregnancy (O15.0).  Example 65: I (a) Chronic myocarditis  (b) Acute myocarditis (I40.9).  Example 66: I (a) Chronic nephritis  (b) Acute nephritis  Code to chronic nephritis, unspecified (N03.9), as special instruction is given to this effect.	1797			2013
	4.1.10 Examples of the modification rules	MRG	October 2011	Major	January
		1791			2013
Delete Rule F	Rule F. Sequelae  Where the selected cause is an early forma of a condition for which the classification provides a separate "Sequelae of" category, and there is evidence that death occurred from residual effects of its condition rather than from those of its active phase, code to the appropriate "Sequelae of" category.  "Sequelae of" categories are as follows: B90 B94, E64. , E68, G09, I69, O97 and Y85 Y87.  Example 67: I (a) Pulmonary fibrosis				

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	(b) Old pulmonary tuberculosis Code to sequelae of respiratory tuberculosis (B90.9).  Example 68: I (a) Bronchopneumonia (b) Curvature of spine (c) Rickets in childhood Code to sequelae of rickets (E64.3).  Example 69: I (a) Hydrocephalus (b) Tuberculous meningitis Code to sequelae of tuberculous meningitis (B90.0).  Example 70: I (a) Hypostatic pneumonia (b) Hemiplegia (c) Cerebrovascular accident (I0 years) Code to sequelae of cerebrovascular accident (I69.4).  Example 71: I (a) Chronic nephritis (b) Scarlet fever Code to sequelae of other specified infectious and parasitic diseases (B94.8). The description of the nephritis as chronic implies that the scarlet fever is no longer in its active phase.				
Page 51  Add text	4.1.11 Notes for use in underlying cause mortality coding  B20- B24 Human immunodeficiency virus [HIV] disease Conditions classifiablespecify the individual conditions listed.  D50-D89 Diseases of blood and blood-forming organs and Certain disorders involving the immune mechanism  as the cause of:  B20-B24 Human immunodeficiency virus [HIV] disease and where the certificate indicates the HIV disease is a result of a blood transfusion given as treatment for the originating condition, code B20-B24	MRG 0108	October 2001	Major	January 2003
Page 51 Add text	4.1.11 Notes for use in underlying cause mortality coding  A46 Erysipelas  B16 Acute hepatitis B	MRG 0173	October 2003	Minor	January 2005

Instruct	tion	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	B17	Other acute viral hepatitis  when reported as the originating antecedent cause of:  K72.1 (Chronic hepatic failure), code B18  K74.0-K74.2, K74.4-K74.6 (Fibrosis and cirrhosis of liver), code B18				
Page 51		Human immunodeficiency virus [HIV] disease or use in underlying cause mortality coding	MRG	October 2003	Minor	January
Delete text	B20-B24  The subcatego	Human immunodeficiency virus [HIV] disease  ries at B20 B23 are the only optional four character codes for countries	0202	Getideel 2303	TAMOI	2005
Add new paragraph	Modes of dyin infection shoul Volume 3 to the					
	4.1.11 Notes f	or use in underlying cause mortality coding	MbRG	October 2007	Major	January
Revise text: Page 54	the left-hand c used is the one of" means that reported as the appear in a cor originating ant A40	notes often indicate that if the provisionally selected code, as indicated in olumn, is present with one of the conditions listed below it, the code to be shown in bold type. There are two types of combination: "with mention the other condition may appear anywhere on the certificate; "when originating antecedent cause of" means that the other condition must rect causal relationship or be otherwise indicated as being "due to" the eccedent cause.  Streptococcal septicaemia sepsis  Other septicaemia sepsis	1238			2010
Add text: p. 55	4.1.11 Notes 1	for use in underlying cause mortality coding	MRG 1142	October 2007	Major	January 2010

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	E10-E14 Diabetes mellitus				
	when reported as the originating antecedent cause of:				
Note –					
changes from	E87.2 (Acidosis), code <b>E10-E14</b> with fourth character .1				
URC#1241	E88.8 (Other specified metabolic disorders), code E10-E14 with				
Chronic	fourth character .1				
kidney disease	G58 (Other mononeuropathies), code <b>E10-E14</b> with fourth				
have been	character .4				
incorporated where	G62.9 (Polyneuropathy, unspecified), code <b>E10-E14</b> with fourth				
appropriate)	character .4 G64 (Other disorders of peripheral nervous system), code <b>E10-E14</b>				
appropriate)	with fourth character .4				
	G70.9 (Myoneural disorder, unspecified), code <b>E10-E14</b> with				
	fourth character .4				
	G71.8 (Other primary disorders of muscles), code <b>E10-E14</b> with				
	fourth character .4				
	<u>G90.9</u> (Disorder of autonomic nervous system, unspecified),				
	code E10-E14 with fourth character .4				
	<u>H20.9</u> ( <u>Iridocyclitis</u> ), code <b>E10-E14</b> with fourth character .3				
	<u>H26.9</u> (Cataract, unspecified), code <b>E10-E14</b> with fourth character .3				
	H30.9 (Chorioretinal inflammation, unspecified), code <b>E10-E14</b> with				
	fourth character .3				
	H34 (Retinal vascular occlusions), code <b>E10-E14</b> with fourth				
	character .3 H35.0 (Background retinopathy and retinal vascular changes),				
	code <b>E10-E14</b> with fourth character .3				
	H35.2 (Other proliferative retinopathy), code <b>E10-E14</b> with fourth				
	character .3				
	H35.6 (Retinal haemorrhage), code <b>E10-E14</b> with fourth character .3				
	H35.9 (Retinal disorder, unspecified), code <b>E10-E14</b> with fourth				
	character .3				
	<u>H49.9</u> (Paralytic strabismus, unspecified), code <b>E10-E14</b> with				
	fourth character .3				
	(Blindness and low vision), code <b>E10-E14</b> with				
	fourth character .3				
	<u>I70.2</u> (Atherosclerosis of arteries of extremities), code <b>E10-E14</b>				
	with fourth character .5				
	173.9 (Peripheral vascular disease, unspecified), code E10-E14 with				
	fourth character .5				

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	199   (Other and unspecified disorders of circulatory system), if angiopathy, code E10-E14 with fourth character .5			update	
Page 55	4.1.11 Notes for use in underlying cause mortality coding  F10-F19 Mental and behavioural disorders due to psychoactive substance use	Canada 1133	October 2007	Minor	January 2009

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	with mention of: X40-X49 (Accidental poisoning by and exposure to noxious substances), code X40-X49				
	Fourth character .0 (Acute intoxication), code X40-X49, X60-X69, X85-X90 or Y10-Y19				
	Fourth character .5 (Psychotic disorder) <i>with mention of</i> Dependence syndrome (.2), code F10-F19 with fourth character .2				
	F10 Mental and behavioural disorders due to use of alcohol with mention of:				
Add codes and	E24.4 (Alcohol-induced Cushing's syndrome), code E24.4				
text:	F10.0 Acute intoxication due to use of alcohol				
	with mention of: F10.2 (Dependence syndrome due to use of alcohol), code F10.2				
	F10.2 Dependence syndrome due to use of alcohol				
	with mention of: F10.4, F10.6, F10.7 Withdrawal state with delirium, Amnesic syndrome, Residual and late-onset psychotic disorder, code F10.4, F10.6, F10.7				
Revise code titles in list	4.1.11 Notes for use in underlying cause mortality coding	Australia 1241	October 2007	Major	January 2010
	I10 Essential (primary) hypertension				
	with mention of:				
	N05 (Unspecified nephritic syndrome), code <b>N05</b>				
	N18 (Chronic renal failure kidney disease), code <b>I12</b> N19 (Unspecified renal failure), code <b>I12</b>				
	(Shipperhear reliant randors), South Andrews				
	I11 Hypertensive heart disease				
	with mention of:				
	I20-I25 (Ischaemic heart disease), code <b>I20-I25</b>				
	N18 (Chronic renal failure kidney disease), code I13 N19 (Unspecified renal failure), code I13				
	N19 (Unspecified renal failure), code <b>I13</b>				

Instruct	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	N00 Acute nephritic syndrome  when reported as the originating antecedent cause of:  N03 (Chronic nephritic syndrome), code N03  N18 Chronic renal failure kidney disease  Unspecified renal failure				
Add text:	4.1.11 Notes for underlying cause mortality coding  K71	MRG 1210	October 2007	Minor	January 2009
	F10 (Mental and behavioural disorders due to use of alcohol), code K70.2				

Instruct	ion	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	<u>T51</u>	(Toxic effect of alcohol), code K70.2				
	K74.2	Hepatic fibrosis with hepatic sclerosis				
	with mention of F10 T51 K74.6 with mention of	(Mental and behavioural disorders due to use of alcohol), code K70.2  (Toxic effect of alcohol), code K70.2  Other and unspecified cirrhosis of liver				
	F10 <u>T51</u>	(Mental and behavioural disorders due to use of alcohol), code K70.3 (Toxic effect of alcohol), code K70.3				
	K75.9	Inflammatory liver disease, unspecified				
	with mention of F10 T51	(Mental and behavioural disorders due to use of alcohol), code K70.1 (Toxic effect of alcohol), code K70.1				
	K76.0	Fatty (change) of liver, not elsewhere classified				
	with mention of F10 T51 K76.9	(Mental and behavioural disorders due to use of alcohol), code K70.0  (Toxic effect of alcohol), code K70.0  Liver disease, unspecified				
	with mention of F10	(Mental and behavioural disorders due to use of alcohol), code K70.9 (Toxic effect of alcohol), code K70.9				
pp. 54-55 Add text:	<b>4.1.11 Notes fo B95</b> -B97	Bacterial, viral and other infectious agents Not to be used for underlying cause mortality coding.	MRG 1066	October 2007	Major	January 2010
	C97	Malignant neoplasms of independent (primary) multiple sites				

Instructio	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	Not to be used for underlying cause mortality coding. When multiple but independent malignant neoplasms are reported on the death certificate, select the underlying cause by applying the Selection and Modification Rules in the normal way. See also section 4.2.7, Malignant neoplasms.				
Page 52 Change existing text as	<u>F03</u> -F09 Organic, including symptomatic, mental disorders	MRG 0151	October 2003	Minor	January 2005
indicated	Not to be used if the underlying physical condition is known				
Page 52	4.1.11 Notes for use in underlying cause mortality coding	MRG 0117	October 2002	Major	January 2006
Add text	F10-F19 Mental and behavioural disorders due to psychoactive substance use	VIII			2000
Delete text	with mention of:  X40-X49 Accidental poisoning by and exposure to noxious substances, code  X40-X49  X60-X69 Intentional self-poisoning by and exposure to noxious substances, code X60-X69  X85-X90 Assault by noxious substances, code X85-X90  Y10-Y19 Poisoning by and exposure to drugs, chemicals and noxious substances, code Y10-Y19				
	Fourth characters .0 (Acute intoxication) and .5 (Psychotic disorder) with mention of Dependence syndrome (.2), code F10-F19 with fourth character .2				
Add text	Fourth character .0 (Acute intoxication), code <b>X40-X49</b> , <b>X60-X69</b> , <b>X85-X90</b> or <b>Y10-Y19</b> Fourth character .5 (Psychotic disorder) with mention of Dependence syndrome (.2), code <b>F10-F19</b> with fourth character .2				
Page 52	4.1.11 Notes for use in underlying cause mortality coding	MRG 0192	October 2003	Minor	January 2005
Add text	F10 Mental and behavioural disorders due to use of alcohol  with mention of:  K70 (Alcoholic liver disease), code <b>K70</b> K72 (Hepatic failure, not elsewhere classified), code <b>K70.4</b>	0172			2003

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	K73 (Chronic hepatitis, not elsewhere classified), code K70.1 K74.0 (Hepatic fibrosis), code K70.2 K74.1 (Hepatic sclerosis), code K70.2 K74.2 (Hepatic fibrosis with hepatic sclerosis), code K70.2 K74.6 (Other and unspecified cirrhosis of liver), code K70.3 K75.9 (Inflammatory liver disease, unspecified), code K70.1 K76.0 (Fatty (change) of liver, not elsewhere classified), code K70.0 K76.9 (Liver disease, unspecified), code K70.9				
Page 52	4.1.11 Notes for use in underlying cause mortality coding	MRG 0160	October 2003	Minor	January 2005
Add text	F10 Mental and behavioural disorders due to use of alcohol  With mention of:  E24.4 (Alcohol-induced Cushing's syndrome), code E24.4				
	G31.2 (Degeneration of the nervous system due to alcohol), code G31.2  G62.1 (Alcoholic polyneuropathy), code G62.1  G72.1 (Alcoholic myopathy), code G72.1  I42.6 (Alcoholic cardiomyopathy), code I42.6  K29.2 (Alcoholic gastritis), code K29.2  K70 (Alcoholic liver disease), code K70  K85 (Acute pancreatitis), code K85				
	K86.0 (Alcohol-induced chronic pancreatitis), code <b>K86.0</b> O35.4 (Maternal care for (suspected) damage to foetus from alcohol), code, O35.4				
	<b>4.1.11 Notes for use in underlying cause mortality coding</b> F10 Mental and behavioural disorders due to use of alcohol with mention of:	MRG 1065	October 2006	Minor	January 2008
	K76.9 (Liver disease, unspecified), code <b>K70.9</b>				
Add text page 55	K85.2 (Alcohol-induced acute pancreatitis), code K85.2 K86.0 (Alcohol-induced chronic pancreatitis), code K86.0				
	K85.9 Acute pancreatitis, unspecified with mention of:				

Instruct	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	F10 (Mental and behavioural disorders due to use of alcohol), code <b>K85.2</b>				
Page 52	4.1.11 Notes for use in underlying cause mortality coding	MRG 0209	October 2004	Minor	January 2006
Delete text	F17 Mental and behavioural disorders due to use of tobacco	0209			2006
	when reported as the originating antecedent cause of:				
	C34. (Malignant neoplasm of bronchus and lung), code C34 120 125 (Ischaemic heart disease), code 120-125				
Add text	J40 J47 (Chronic lower respiratory disease), code <b>J40-J47</b>				
	Not to be used if the resultant physical condition is known				
Page 53 Add text	IO8 Multiple valve diseases	MRG 0199	October 2003	Minor	January 2005
	Not to be used for multiple valvular diseases of specified, but non rheumatic origin. When multiple valvular diseases of non-rheumatic origin are reported on the same death certificate, the underlying cause should be selected by applying the General Principle or Rules 1,2 or normal way.				
Page 55 Delete text	4.1.11 Notes for use in underlying cause mortality coding	MRG 0210	October 2004	Major	January 2006
Delete text	I15. Secondary hypertension	0210			2000
	Not to be used for underlying cause mortality coding. If the cause is stated, code to Other ill-defined and unspecified causes of mortality (R99).				
Add text	I15.0 Renovascular hypertension				
	Not to be used if the antecedent condition is known or can be inferred by an application of Rule 3. If the antecedent condition is not known or cannot be inferred, code to I15.0.				

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	Not to be used if the antecedent condition is known or can be inferred by an application of Rule 3. If the antecedent condition is not known or cannot be inferred, code to N28.9.				
	I15.2 Hypertension secondary to endocrine disorders  Not to be used if the antecedent condition is known or can be inferred by an application of Rule 3. If the antecedent condition is not known or cannot be inferred, code to E34.9.				
	Not to be used if the antecedent condition is known or can be inferred by an application of Rule 3. If the antecedent condition is not known or cannot be inferred, code to I15.8.				
	Not to be used if the antecedent condition is known or can be inferred by an application of Rule 3. If the antecedent condition is not known or cannot be inferred, code to I15.9.				
Page 55	4.1.11 Notes for use in underlying cause mortality coding  I24.0 Coronary thrombosis not resulting in myocardial infarction  Not to be used for underlying cause mortality coding. For mortality the occurrence of myocardial infarction is assumed and assignment made to I21 or I22 as appropriate	MRG 0261	October 2004	Major	January 2006
Add text	Not to be used for underlying cause mortality coding. If				

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	the cause is not stated, code to Other forms of chronic ischaemic heart disease (I25.8)				
	I27.9 Pulmonary heart disease, unspecified				
	with mention of:				
	M41 (Scoliosis), code <b>I27.1</b>				
Page 56 Add text	4.1.11 Notes for use in underlying cause mortality coding  I60-I69 Cerebrovascular diseases	MRG 0151	October 2003	Minor	January 2005
	when reported as the originating antecedent cause of conditions in:				
	<u>F01-F03, code <b>F01</b></u>				
Page 56  Modify code range Add text	4.1.11 Notes for use in underlying cause mortality coding  I67.2 Cerebral atherosclerosis  with mention of:  I60-I66 (Cerebral haemorrhage, cerebral infarction or stroke, occlusion and stenosis of	MRG 0163	October 2003	Minor	January 2005
pp.56-7	precerebral and cerebral arteries), code I60-I64.  4.1.11 Notes for use in underlying cause mortality coding  I67.2 Cerebral atherosclerosis	MRG 0338	October 2005	Major	January 2010
	with mention of: I60-I66 (Cerebral haemorrhage, cerebral infarction or stroke, occlusion and stenosis of precerebral and cerebral arteries), code <b>I60-I64</b> .				
Modify	When reported as the originating antecedent cause of conditions in: F03 (Unspecified dementia), code F01 G20 (Parkinson's disease), code G20 G21.4 G21.9 (Secondary parkinsonism, unspecified), code G21.4				

Instruction	on Instruction manual entries	Source L	ate approved	Major/ Minor update	Implementati on date
	I70.9 Generalised and unspecified atherosclerosis				
	With mention of: R02 (Gangrene, not elsewhere classified), code I70.2  When reported as the originating antecedent cause of: F01 (Vascular dementia), code F01 F03 (Unspecified dementia), code F01 G20 (Parkinson's disease), code G20-G21.4 G21.9 (Secondary parkinsonism, unspecified), code G21.4				
Page 57	4.1.11 Notes for use in underlying cause mortality coding  170 Atherosclerosis	MRG 0152	October 2003	Major	January 2006
	With mention of:				
Change existing text as indicated	I10-I13 (Hypertensive disease), code I10-I13 I20-I25 (Ischaemic heart diseases), code I20-I25 I50 (Heart failure), code I50 I51.4 (Myocarditis, unspecified), code I51.4 I51.5 (Myocardial degeneration), code I51.5 I51.6 (Cardiovascular disease, unspecified), code I51.6 I51.8 (Other ill-defined heart diseases), code I51.8				
Delete text	I51.8 (Other ill-defined heart diseases), code <b>I51.8</b> I51.9 (Heart disease, unspecified), code <b>I51.9</b> I60-I69 (Cerebrovascular diseases), code <b>I60-I69</b>				
Add text	When reported as the originating antecedent cause of:  I05-I09 (Conditions classifiable to I05-I09 but not specified as rheumatic), code I34-I38 I34-I38 (Nonrheumatic valve disorders), code I34-I38 I51.9 (Heart disease, unspecified), code I25.1				
Add text	I71-I78 (Other diseases of arteries, arterioles and capillaries), code I71-I78  K55 (Vascular disorders of intestine), code K55  N26 (Unspecified contracted kidney), code I12				

Instructi	on Instruction manual entries	Source I	Date approved	Major/ Minor update	Implementati on date
Page 57	4.1.11 Notes for use in underlying cause mortality coding	MRG 0170	October 2003	Minor	January 2005
	I70 Atherosclerosis  With mention of:   when reported as the originating antecedent cause of:  I05-I09 (Conditions classifiable to I05-I09 but not specified as rheumatic),  code I34-I38  I34-I38 (Nonrheumatic valve disorders), code I34-I38	0170			2005
	I71-I78 (Other diseases of arteries, arterioles and capillaries), code I71-I78				
Add text	K55 (Vascular disorders of intestine), code <b>K55</b> N03 (Chronic nephritis), code I12  N26 (Unspecified contracted kidney), code <b>I12</b>				
Page 57	4.1.11 Notes for use in underlying cause mortality coding	MRG	October 2003	Minor	January
	I70.9 Generalised and unspecified atherosclerosis	0151			2005
	With mention of:				
	R02 (Gangrene, not elsewhere classified), code <b>I70.2</b>				
	When reported as the originating antecedent cause of:				
Add text	F01 (Vascular dementia), code F01 F03 (Unspecified dementia), code F01 G20 (Parkinson's disease), code G20				
Modify page	4.1.11 Notes for use in underlying cause mortality coding	MRG –proposed and	October 2005	Major	October
61	J00 Acute nasopharyngitis [common cold] J06 Acute upper respiratory infections of multiple and unspecified sites  when reported as the originating antecedent cause of:	ratified at meeting in Tokyo October 2005			2005
	G03.8 (Meningitis), code <b>G03.8</b>				

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Revise code	G06.0 (Intracranial abscess and granuloma), code G06.0 H65-H66 (Otitis media), code H65-H66 H70 (Mastoiditis and related conditions), code H70 J09J10-J18 (Influenza and pneumonia), code J09 J10-J18 J20-J21 (Bronchitis and bronchiolitis), code J20-J21 J40-J42 (Unspecified and chronic bronchitis), code J40-J42 J44 (Other chronic obstructive pulmonary disease), code J44 N00 (Acute nephritic syndrome), code N00				
Add text p. 61	4.1.11 Notes for use in underlying cause mortality coding  J06 Acute upper respiratory infections of multiple and unspecified sites  J18 Pneumonia, organism unspecified With mention of:  R26.3 (Immobility), code to J18.2 J20 Acute bronchitis	MRG 1037	October 2006	Major	January 2010
Add text	4.1.11 Notes for use in underlying cause mortality coding  J43 Emphysema  J44.8-J44.9 Other and unspecified chronic obstructive pulmonary disease  With mention of:  J12-J18 (Pneumonia), code J44.0  J20-J22 (Other acute lower respiratory infections), code J44.0  J45 Asthma	MRG 1035	October 2006	Major	January 2010
Page 59	4.1.11 Notes for use in underlying cause mortality coding  J95 Postprocedural respiratory disorders, not elsewhere classified	MRG 0192	October 2003	Minor	January 2005
Add text	Not to be used for underlying cause mortality coding. See Operations, p 71.  K72 Hepatic failure, not elsewhere classified  with mention of:				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	F10 (Mental and behavioural disorders due to use of alcohol), code <b>K70.4</b>				
<u>K73</u>	Chronic hepatitis, not elsewhere classified				
	with mention of:				
	F10 (Mental and behavioural disorders due to use of alcohol), code <b>K70.1</b>				
<u>K74.0</u>	Hepatic fibrosis				
	with mention of:				
	F10 (Mental and behavioural disorders due to use of alcohol), code <b>K70.2</b>				
<u>K74.1</u>	•				
	with mention of:				
	F10 (Mental and behavioural disorders due to use of alcohol), code  K70.2				
<u>K74.2</u>	Hepatic fibrosis with hepatic sclerosis				
	with mention of:				
	F10 (Mental and behavioural disorders due to use of alcohol), code <b>K70.2</b>				
K74.6					
	with mention of:				
	F10 (Mental and behavioural disorders due to use of alcohol), code <b>K70.3</b>				
<u>K75.9</u>	Inflammatory liver disease, unspecified				
	with mention of:				

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	F10 (Mental and behavioural disorders due to use of alcohol), code  K70.1				
	K76.0 Fatty (change) of liver, not elsewhere classified				
	with mention of:				
	F10 (Mental and behavioural disorders due to use of alcohol), code  K70.0				
	K76.9 Liver disease, unspecified				
	with mention of:				
	F10 (Mental and behavioural disorders due to use of alcohol), code <b>K70.9</b>				
Add	4.1.11 Notes for use in underlying cause mortality coding	MRG	October 2006	Minor	January
instructional note	P07 Disorders related to short gestation and low birth weight, not elsewhere classified	1026	300001 2000	IVIIII OI	2008
p. 61 2 <sup>nd</sup> edition,	P08 Disorders related to long gestation and high birth weight  Not to be used if any other cause of perinatal mortality is reported. This does not apply if				
page 65	the only other cause of perinatal mortality reported is respiratory failure of newborn (P28.5).				
Page 61 Add text	4.1.11 Notes for use in underlying cause mortality coding P70.3 – P72.0 Transitory endocrine and metabolic disorders specific to fetus	MRG 0120	October 2002	Minor	January 2004
	and newborn  Not to be used for underlying cause mortality coding. If no other				
	perinatal cause is reported, code to Condition originating in the perinatal period, unspecified (P96.9).				
Add text	P72.2 – P74 Transitory endocrine and metabolic disorders specific to fetus and newborn				
	Not to be used for underlying cause mortality coding. If no other				

Instruction		Source	Date approved	Major/ Minor update	Implementati on date
	perinatal cause is reported, code to Condition originating in the perinatal period, unspecified (P96.9).				
Page 65  Add new note:	4.1.11 Notes for use in underlying cause mortality coding  perinatal period, unspecified (P96.9)  R57.2 Septic shock R65.0 Systemic inflammatory response syndrome of infectious origin without organ failure  R65.1 Systemic inflammatory response syndrome of infectious origin with organ failure  Not to be used for underlying cause mortality coding. Code to the originating infectious disease (A00-B99). If no originating infectious disease is mentioned, code to unspecified sepsis (A41.9).  R69 Unknown and unspecified causes of morbidity	MbRG 1240	October 2008	Major	January 2010
Page 61  Add text	4.1.11 Notes for use in underlying cause mortality coding  R69 Unknown and unspecified causes of morbidity  S00-T98 Injury, poisoning and certain other consequences of external causes  Not to be used for underlying cause mortality coding except as an additional code to the relevant category in V01-Y89.  When a disease of bone density is reported on the same line or as the original antecedent cause of a fracture, the fracture should be considered pathological, code M80  S02	MRG 0174	October 2003	Minor	January 2005
Page 61 Delete text	4.1.11 Notes for use in underlying cause mortality coding  T36 T50 Poisoning by drugs, medicaments and biological substances  (accidental poisoning and poisoning of undetermined intent by alcohol or dependence producing drugs)	MRG 0117	October 2002	Major	January 2006

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	with mention of:				
	F10 F19 with fourth character .2 (alcohol dependence or drug dependence), code F10 F19 with fourth character .2				
Page 62	4.1.11 Notes for use in underlying cause mortality coding	MRG 0117	October 2002	Major	January 2006
Delete text	X40 X49 Accidental poisoning by and exposure to noxious substances Y10 Y15 Poisoning by and exposure to noxious substances, undetermined intent (poisoning by alcohol or dependence producing drugs)	oii,			2000
	with mention of:  F10 F19 with fourth character .2 (alcohol dependence or drug dependence), code F10 F19 with fourth character .2				
	4.1.11 Notes for use in underlying cause mortality coding				
Add text:	Not to be used for underlying cause mortality coding. If primary site of malignant neoplasm is not known indicated, code to Malignant neoplasm without specification of site (C80)	Canada 1603	October 2009	Minor	January 2011
	4.1.11 Notes for use in underlying cause mortality coding  I10 Essential (primary) hypertension	MRG 1554	October 2009	Major	January 2013
Add text	with mention of:  II1 (Hypertensive heart disease), code II1 II2 (Hypertensive renal disease), code II2 II3 (Hypertensive heart and renal disease), code II3 I20-I25 (Ischaemic heart disease), code I20-I25 I50 (Heart failure), code I11.0 I51.4- (Complications and ill-defined I51.9 descriptions of heart disease), code II1				

Instruction	n	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
		I60-I69 (Cerebrovascular disease), code <b>I60-I69</b> N00 (Acute nephritic syndrome), code <b>N00</b>				
Delete text		when reported as the originating antecedent cause of:  H35.0 (Background retinopathy and other vascular changes), code H35.0 I05-I09 (Conditions classifiable to I05-I09 but not specified as rheumatic), code I34-I38 I34-I38 (Nonrheumatic valve disorders), code I34-I38 I50. (Heart failure), code I11.0 I51.4 (Complications and ill defined				
	I11	Hypertensive heart disease  Hypertensive heart disease				
	111.	with mention of:				
		I12 (Hypertensive renal disease), code I13 I13 (Hypertensive heart and renal disease), code I13 I20-I25 (Ischaemic heart disease), code I20-I25 N18 (Chronic renal failure), code I13 N19 (Unspecified renal failure), code I13 N26 (Unspecified contracted kidney), code I13				
	I12	Hypertensive renal disease				
		with mention of:				
		I11 (Hypertensive heart disease), code I13 I13 (Hypertensive heart and renal disease), code I13				
Add text		I20-I25 (Ischaemic heart disease), code I20-I25 I50 (Heart failure), code I13.0 I51.4- (Complications and ill-defined I51.9 descriptions of heart disease), code I13				

Instructi	on	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Delete text		when reported as the originating antecedent cause of:				
		I50. (Heart failure), code I13.0 I51.4 (Complications and ill defined I51.9 descriptions of heart disease), code I13				
	I13	Hypertensive heart and renal disease				
		with mention of:				
		I20-I25 (Ischaemic heart disease), code <b>I20-I25</b>				
	I51.4- I51.9	Complications and ill-defined descriptions of heart disease				
		with mention of:				
		B57 (Chagas' disease), code <b>B57</b> (Ischaemic heart diseases), code <b>I20-I25</b>				
	I50 I51.9	Heart failure Heart disease, unspecified				
		with mention of:				
Add text		I10 II1.0 II1.1 II1.1 II2.0 II2.0 II2.0 II3.1 II3.0 II3.0 II3.0 II3.0 II3.1 II3.1 II3.1 II3.1 II3.0 II3.0 II3.1 II3.1 II3.0 II3.0 II3.0 II3.1 II3.1 II3.0 II3.0 II3.0 II3.0 II3.0 II3.1 II3.1 II3.0 II3.0 II3.0 II3.0 II3.0 II3.0 II3.0 II3.1 II3.1 II3.0				

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	I13.2 (Hypertensive heart and renal disease with both (congestive) heart failure and renal  failure), code I13.2  I13.9 (Hypertensive heart and renal disease with renal failure, unspecified), code I13.0  M41 (Scoliosis), code I27.1				
Page 59	4.1.11 Notes for use in underlying cause mortality coding	MRG 1725	October 2010	Minor	January 2012
Add note	F80 Specific developmental disorders of speech and language F81 Specific developmental disorders of scholastic skills  Not to be used if underlying physical condition is known				
	4.1.11 Notes for use in underlying cause mortality coding	MRG 1797	October 2011	Minor	January 2013
Add note	Add note on A51, early syphilis:	1,,,			2010
	A51 Early syphilis  with mention of:  A52 (Late syphilis), code A52				
Add text	F10-F19 Mental and behavioural disorders due to psychoactive substance use				
	Fourth character .2 (Dependence syndrome) with mention of Withdrawal state with delirium (.4), code F10-F19 with fourth character .4				
	Fourth character .2 (Dependence syndrome) with mention of Amnesic syndrome (.6), code F10-F19 with fourth character .6				
	Fourth character .2 (Dependence syndrome) with mention of Residual and late-onset psychotic disorder (.7), code F10-F19 with fourth character .7				
Delete note	F10.2 Dependence syndrome due to use of alcohol				

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	with mention of:				
	F10.4, F10.6, F10.7 Withdrawal state with delirium, Amnesic syndrome, Residual and late onset psychotic disorder, code F10.4, F10.6, F10.7				
Add note	L89 Decubitus ulcer and pressure area				
	When reported as the originating antecedent cause of:				
	L89 (Decubitus ulcer and pressure area) of a more advanced stage, code L89 with the fourth character for the more advanced stage				
	N18 Chronic kidney disease when reported as the originating antecedent cause of:				
	N18 (Chronic kidney disease) of a more advanced stage, code N18 with the fourth character for the more advanced stage				
	4.1.11 Notes for use in underlying cause mortality coding	MRG 1219	October 2011	Major	January 2013
Delete text	S02. Fracture of skull and facial bones	1217			2013
	When more than one site is mentioned, code to multiple fractures involving skull and facial bones, S02.7				
	S06. Intracranial injury				
	When a fracture of the skull or facial bones is associated with an intracranial injury, priority should be given to the fracture.				
	with mention of:				
	S02. (Fracture of skull or facial bones), code S02.				
Correction of a typographical	Section 4.1.11	MRG 1784	October 2011	Minor	January 2013
error	E10-E14 Diabetes mellitus	1/07			2013

Instructio	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	when reported as the originating antecedent cause of				
	M79.2 (Neuralgia and neuritis, unspecified), code E10-E14 with fourth character <b>.6.4</b>				
	4.1.11 Notes for use in underlying cause mortality coding	MRG	October 2011	Minor	January
	• • • •	1864			2013
Revise text	E10-E14 Diabetes mellitus				
	when reported as the originating antecedent cause with mention of: E87.2 (Acidosis), code E10-E14 with fourth character .1 E88.8 (Other specified metabolic disorders), code E10-E14 with fourth character .4 G62.9 (Polyneuropathy, unspecified), code E10-E14 with fourth character .4 G64 (Other disorders of peripheral nervous system), code E10-E14 with fourth character .4 G70.9 (Myoneural disorder, unspecified), code E10-E14 with fourth character .4 G70.9 (Myoneural disorders of muscles), code E10-E14 with fourth character .4 G70.9 (Other primary disorders of muscles), code E10-E14 with fourth character .4 G70.9 (Disorder of autonomic nervous system, unspecified), code E10-E14 with fourth character .4 H20.9 (Iridocyclitis), code E10-E14 with fourth character .3 H26.9 (Cataract, unspecified), code E10-E14 with fourth character .3 H30.9 (Chorioretinal inflammation, unspecified), code E10-E14 with fourth character .3 H35.0 (Background retinopathy and retinal vascular changes), code E10-E14 with fourth character .3 H35.2 (Other proliferative retinopathy), code E10-E14 with fourth character .3 H35.3 (Retinal haemorrhage), code E10-E14 with fourth character .3 H35.9 (Retinal disorder, unspecified), code E10-E14 with fourth character .3 H35.9 (Paralytic strabismus, unspecified), code E10-E14 with fourth character .3 H35.9 (Peripheral vascular disease, unspecified), code E10-E14 with fourth character .3 H35.9 (Other and unspecified disorders of circulatory system), if angiopathy, code E10-E14 with fourth character .5 H36.9 (Other and unspecified disorders of circulatory system), if angiopathy, code E10-E14 with fourth character .6 L92.1 (Necrobiosis lipoidica, not elsewhere classified), code E10-E14 with fourth character .6				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
<u>L97</u>	(Ulcer of lower limb), code E10-E14 with fourth character .5				
M13.9	\ ' 1 ''				
M79.2	(Neuralgia and neuritis, unspecified), code <b>E10-E14</b> with fourth character .4				
	(Disorder of bone, unspecified), code E10 E14 with fourth character .6				
	05(Nephrotic syndrome), code <b>E10-E14</b> with fourth character .2				
N18	(Chronic kidney disease), code <b>E10-E14</b> with fourth character .2				
N19	(Unspecified kidney failure), code <b>E10-E14</b> with fourth character .2				
N26	(Unspecified contracted kidney), code <b>E10-E14</b> with fourth character .2				
N28.9 characte	(Disorder of kidney and ureter, unspecified), code <b>E10-E14</b> with fourth				
	(Urinary tract infection, site not specified), code E10-E14 with fourth character				
. <del>.6</del>	(Ormary tract infection, she not specified), code <b>E10-E14</b> with fourth character				
N39.1	(Persistent proteinuria, unspecified), code <b>E10-E14</b> with fourth character .2				
R02	(Gangrene, not elsewhere classified), code <b>E10-E14</b> with fourth character .5				
R40.2	(Coma, unspecified), code <b>E10-E14</b> with fourth character <b>.0</b>				
R79.8	(Other specified abnormal findings of blood chemistry), if				
	mia, azotemia, and related conditions, code <b>E10-E14</b> with fourth character <b>.1</b>				
	<b>, ,</b>				
Any	of above in combination, code <b>E10-E14</b> with fourth character .7				
<u> </u>	when reported as the originating antecedent cause of:				
<u>E15</u>	(Non-diabetic hypoglycaemic coma; for unspecified hypoglycemic coma				
only),					
	code E10-E14 with fourth character .0				
<u>G70.9</u>	(Myoneural disorder, unspecified), code E10-E14 with fourth character .4				
<u>G98</u>	(Other disorders of the nervous system, not elsewhere classified; except				
	Charcot's arthropathy, non-syphilitic), code <b>E10-E14</b> with fourth character .4				
<u>G98</u>	(Other disorders of the nervous system, not elsewhere classified; if Charcot's				
1140.0	arthropathy, non-syphilitic), code E10-E14 with fourth character .6				
<u>H49.9</u>	(Paralytic strabismus, unspecified), code <b>E10-E14</b> with fourth character .3				
<u>H54</u>	(Blindness and low vision), code <b>E10-E14</b> with fourth character .3				
<u>199</u>	(Other and unspecified disorders of circulatory system); for Angiopathy only, code E10-E14 with fourth character .5				
K31.8	(Other specified diseases of stomach and duodenum; for gastroparesis only),				
<u>K31.8</u> <u>code</u>	(Outer specified diseases of stomach and duodenum; for gastroparests only),				
code	E10-E14 with fourth character .4				
L30.9	(Dermatitis, unspecified), code <b>E10-E14</b> with fourth character .6				
L98.4	(chronic ulcer of skin, not elsewhere classified), code <b>E10-E14</b> with fourth				
<u> 1270.4</u>	character .5				

Instruct	ion Instruction manual entries	Source D	ate approved	Major/ Minor update	Implementati on date
	M89.9 (Disorder of bone, unspecified), code <b>E10-E14</b> with fourth character .6  N39.0 (Urinary tract infection, site not specified), code <b>E10-E14</b> with fourth character .6  Any of above in combination, code <b>E10-</b> E14 with fourth character .7				
Add text	4.1.11 Notes for use in underlying cause mortality coding  Output  Out	MRG 1904	October 2012	Minor	January 2014
Page 62 Add	4.1.12 Summary of linkages by code number  Table 1. Summary of linkages by code number  Selected cause As cause of: Resulting linked code D50-D59 B20-B24 B20-B24	Mortality Reference Group 0108	October 2001	Major	January 2003
Page 62	4.1.12 Summary of linkages by code number  Table 1. Summary of linkages by code number  Selected cause: With mention of: Resulting linked code	MRG 0117	October 2002	Major	January 2006
Add codes Page 65	E86 A00-A09 A00-A09 F10-F19 X40-X49 X40-X49 F10-F19 X60-X69 X60-X69 F10-F19 X85-X90 X85-X90 F10-F19 Y10-Y19 Y10-Y19				
Delete codes	T36 T50 F10 F19 (F1x.2) F10 F19 (F1x.2)  X40-X49				
Page 62	4.1.12 Summary of linkages by code number  Table 1. Summary of linkages by code number  Selected cause: With mention of: As cause of: Resulting	MRG 0160	October 2003	Minor	January 2005
Add codes	linked code:	_			

Instruc	tion	Instruction manual	entries	Source	Date approved	Major/ Minor update	Implementati on date
	F10	E24.4  G31.2  G62.1  G72.1  I42  K29.2  K70	E24.4  G31.2  G62.1  G72.1  142.6  K29.2  K70				
		K85 K86.0 O35.4	K85 K86.0 O35.4				
	4.1.12 Summar	y of linkages by code number		MRG 1065	October 2006	Minor	January 2008
Add text	Selected cause	ry of linkages by code number  With mention of: As cause of:	Resulting linked code				
	F10	K74.6 K75.9 K76.0 K76.9 K85.2 K86.0 O35.4 F10.4, F10.6,	K70.3 K70.1 K70.0 K70.9 K85.2 K86.0 O35.4 F10.4, F10.6, F10.7				
	 <u>K85.9</u>	<u>F10</u>	<u>K85.2</u>				
Add text  Add codes p. 69		y of linkages by code number ary of linkages by code number		MRG 1035	October 2006	Major	January 2010
P. 07	Selected cause W J43	7ith mention of: As cause of: Resulting l J40	ined code J44				

Instructi	on		Instruction 1	nanual entries	Source	Date approved	Major/ Minor update	Implementati on date
	 <u>J44.8-J44.9</u> J60-J64	J12-J J20-J		J44.0 J44.0				
p. 64	4.1.12 Summar		y code number  by code number		MRG 0338	October 2005	Major	January 2010
	Selected cause I67.2	With mention I60-I66	of: As cause of: F03 G20 G21.9	Resulting linked code I60-I64 F01 G21.4 G21.4				
Modify	170.9	R02	F03 G20 G21.9	I70.2 F01 <del>G20</del> <u>G21.4</u> <u>G21.4</u>				
Revise codes:	Table 1. Summo	ary of linkages l	•	r Resulting linked code	MRG 1142	October 2007	Major	January 2010
	E10-E14	with mention o	E87.2 E88.8 G58 G62.9 G64 G70.9 G71.8 G90.9 H20.9 H26.9 H30.9	E10-14 (E1x.1) E10-14 (E1x.1) E10-14 (E1x.4) E10-14 (E1x.4) E10-14 (E1x.4) E10-14 (E1x.4) E10-14 (E1x.4) E10-14 (E1x.4) E10-14 (E1x.3) E10-14 (E1x.3) E10-14 (E1x.3) E10-14 (E1x.3) E10-14 (E1x.3)				

Instructio	on Instruction manual entries	Source Da	ite approved	Major/ Minor update	Implementati on date
	H35.0 H35.2 E10-14 (E1x.3) H35.6 E10-14 (E1x.3) H35.9 E10-14 (E1x.3) H49.9 E10-14 (E1x.3) H54 E10-14 (E1x.3) I73.9 E10-14 (E1x.5) I70.2 E10-14 (E1x.5) L30.9 E10-14 (E1x.6) L92.1 E10-14 (E1x.6) M13.9 E10-14 (E1x.6) M79.2 E10-14 (E1x.4) M89.9 E10-14 (E1x.6) N03-N05 N03-N05 E10-14 (E1x.2) N18 N18 N18 N19 E10-14 (E1x.2) N19 E10-14 (E1x.2) N26 E10-14 (E1x.2) N28.9 E10-14 (E1x.2) N39.0 E10-14 (E1x.2) R02 E10-14 (E1x.5)				
Page 69   Add	4.1.12 Summary of linkages by code number         Table 1. Summary of linkages by code number         Selected cause With mention of: As cause of: Resulting linked code         064       065         R57.2       A00-B99         R65.01       A00-B99         S06       S02	MbRG 1240)	2008	Major	January 2010
Modify p. 76	4.1.12 Summary of linkages by code number  Table 1. Summary of linkages by code number  Page 86 – revise codes  J00 }	URC (Proposed and ratified at meeting in Tokyo Oct'05)	October 2005	Major	October 2005

Instructi	on	Instruction manual e	ntries	Source	Date approved	Major/ Minor update	Implementati on date
Revise code	J06 }	G03.8 G06.0 H65-H66 H70 J09J10-J18 J20-J21 J40-J42 J44 N00	G03.8 G06.0 H65-H66 H70 J09J10-J18 J20-J21 J40-J42 J44 N00				
	4.1.12 Summary of linkages	hy codo numbor		MRG	October 2011	Major	January
Delete line	[Table 1. Summary of linkages]  "S06.— S02.— S02.—"			1219	October 2011	Wiajoi	2013
	4.1.12 Summary of linkages	by code number		MRG 1864	October 2011		January 2013
	Table 1. Summary of linkage	es by code number		1804			2013
	Selected cause With men	ation of: As cause of:	Resulting linked code				
	E10-E14	<u>E15</u>	E10-E14(E1x.0)				
Revise codes	E87.2		E10-E14(E1x.1)				
Revise codes	E88.8		E10-E14(E1x.1)				
	G58		E10-E14(E1x.4)				
	G62.9 G64		E10-E14(E1x.4) E10-E14(E1x.4)				
	<del>G70.9</del>	<u>G70.9</u>	E10-E14(E1x.4) E10-E14(E1x.4)				
	G71.8	<u>070.9</u>	E10-E14(E1x.4)				
	G90.9		E10-E14(E1x.4)				
	3,0.7	G98 (except Charcot's	E10-E14(E1x.4)				
		arthopathy, non-syphilitic)					

Instruction		Instruction manual	entries	Source	Date approved	Major/ Minor update	Implementati on date
		G98 (if Charcot's	E10-E14(E1x.6)				
	****	arthopathy, non-syphilit					
	H20.9		E10-E14(E1x.3)				
	H26.9		E10-E14(E1x.3)				
	H30.9		E10-E14(E1x.3)				
	H34		E10-E14(E1x.3)				
	H35.0		E10-E14(E1x.3)				
	H35.2		E10-E14(E1x.3)				
	H35.6		E10-E14(E1x.3)				
	H35.9		E10-E14(E1x.3)				
	H49.9	<u>H49.9</u>	E10-E14(E1x.3)				
	H54	<u>H54</u>	E10-E14(E1x.3)				
	I70.2		E10-E14(E1x.5)				
	I73.9		E10-E14(E1x.5)				
	199	<u>199</u>	E10-E14(E1x.5)				
		<u>K31.8</u>	E10-E14(E1x.4)				
	<del>L30.9</del>	<u>L30.9</u>	E10-E14(E1x.6)				
	L92.1		E10-E14(E1x.6)				
	<u>L97</u>		E10-E14(E1x.5)				
		<u>L98.4</u>	E10-E14(E1x.5)				
	M13.9		E10-E14(E1x.6)				
	M79.2		E10-E14(E1x.4)				
	M89.9	<u>M89.9</u>	E10-E14(E1x.6)				
	N03-N05		E10-E14(E1x.2)				
	N18		E10-E14(E1x.2)				
	N19		E10-E14(E1x.2)				
	N26		E10-E14(E1x.2)				
	N28.9		E10-E14(E1x.2)				
	N39.0	<u>N39.0</u>	E10-E14(E1x.6)				
	N39.1		E10-E14(E1x.2)				
	R02		E10-E14(E1x.5)				

Instructi	on Instruction r	nanual entries	Source	Date approved	Major/ Minor update	Implementati on date
	R40.2	E10-E14(E1x.0)				
	R79.8	E10-E14(E1x.1)				
Page 66	4.1.12 Summary of linkages by code number		MRG 0120	October 2002	Minor	January 2004
	Table 2. Summary of codes not to be used in un	derlying cause mortality coding	0120			2004
Add codes to existing table	Codes not to be used for underlying cause mortali if no code is indicated, code to R99)	ty coding (code to item in parentheses;				
Calsting table	P70.3 – P72.0 (code to P96.9) P72.2 – P74 (code to P96.9)					
Page 66	4.1.12 Summary of linkages by code number		MRG 0116	October 2002	Major	January 2006
	Table 2. Summary of codes not to be used in un	derlying cause mortality coding				
	Codes not to be used for underlying cause Mortality coding (code to item in parentheses;					
	If no code is indicated, code to R99)					
Add list of	F10.0 (code to X45, X65, X85, or Y15)					
codes to existing table	F11.0 (code to X42, X62, X85, or Y12) F12.0 (code to X42, X62, X85, or Y12)					
existing table	F13.0 (code to X41, X61, X85, or Y11)					
	F14.0 (code to X42, X62, X85, or Y12)					
	F15.0 (code to X41, X61, X85, or Y11) F16.0 (code to X42, X62, X85, or Y12)					
	F17.0 (code to X49, X69, X89, or Y19)					
	F18.0 (code to X46, X66, X89, or Y16) F19.0 (code to X40-X49, X60-X69, X85-X90, or	or Y10-Y19)				
Page 66	4.1.12 Summary of linkages by code number		MRG	October 2004	Major	January
	Table 2. Summary of codes not to be used in	n underlying cause mortality coding <sup>a</sup>	0261			2006
	, ,	be used if				
		nderlying is known				
	in parentneses; if no code is indicated, cause:	IS KHOWH				

Instructi	on Instruction manual en	ntries	Source	Date approved	Major/ Minor update	Implementati on date
Add text to table	code to R99)   I23 (code to I21 or I22) H90 I24.0 (code to I21 or I22) N40 I25.2 (code to I25.8) N97 I65 (code to I63)					
Page 66  Delete code  Add code	4.1.12 Summary of linkages by code number  Table 2 Summary of codes not to be used in underlying camortality coding  Codes not to be used for underlying cause mortality coding (code to item in parentheses; if no code is indicated, code to R99)  H95  H95  G83  H54  I23 (code to I21 or I22)  H90-91  I15	f the underlying	MRG 0210	October 2004	Major	January 2006
p. 70 Add codes:	mortality coding (code to item in parentheses; if no code is indicated, code to <b>R99</b> )  B95-B97  C97  E89  F10.0 (code to X45, X65, X85, or Y15)  F11.0 (code to X42, X62, X85, or Y12)	Not to be used if the underlying cause is known  F03-F09 F70-F79 G81 G82	MRG 1066	October 2007	Major	January 2010
Page 70	4.1.12 Summary of linkages by code number		MbRG	October 2008	Major	January

Instructi	n Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Add	Table 2. Summary of codes not to be used in underlying cause mortality coding P72.2-P74 (code to P96.9) R57.2 (code to A41.9) R65.01 (code to A41.9) R69 (code to R95-R99)	1240			2010
Make the following chan ges to Volume 2.	Color	MRG 1554	October 2009	Major	January 2013
	4.1.12 Summary of linkages by code number  Table 2. Summary of codes not to be used in underlying cause mortality coding a	Canada 1603	October 2009	Minor	January 2011

Instructio	on Instructi	on manual entries		Source I	ate approved	Major/ Minor update	Implementati on date
Add codes	Codes not to be used for underlying cause mortality coding (code to item in parentheses; if no code is indicated, code to <b>R99</b> )	Not to be used if the underlying cause is known					
	B95-B97	F03-F09					
	<u>C77-C79</u> (code to C80)						
	<u>C97</u> (code to C00-C76, C81-C96)						
	E89	F70 – F79					
	4.1.12 Summary of linkages by code number	per		MRG	October 2009	Major	January
	Table 2. Summary of codes not to be used in	underlying cause mortality coding		1557			2013
	Codes not to be used for underlying cause mortality coding (code to item in parentheses if no code is indicated code to <b>R99</b> )	Not to be used if the ; underlying cause is known					
Add code range	O08 (code to O00-O07)						
Page 67	The following section lists the changes to no improbable". To assist users of the classificits entirety, with the relevant changes, for effected. The reproduced notes appear at the control of the changes of the changes of the changes.	cation, the note has been reproduce every year that a change has been	d in				
Page 67	<b>4.2.2 Interpretation of "highly improbable"</b> As a guide to the acceptability of sequences and the selection rules, the following relations improbable":	s in the application of the General Prin	nciple	Mortality Reference Group 0051	October 2000	Minor	January 2002
	(a) an infectious or parasitic disease (A00-B9) this chapter, except that:	9) reported as "due to" any disease ou	tside				
Replace existing text with this revised rule	any infectious disease may be accepted a mechanism such as human immunodefici immunosuppression by chemicals (chemo disease classified to A00-B19 or B25-B6 neoplasm will also be an acceptable sequ	tency virus [HIV] disease or AIDS; otherapy) and radiation. Any infection 4 reported as "due to" a malignant	1 <u>S</u>				
p. 67	4.2.2 Interpretation of "highly improb	able"		MRG	October 2005	Major	January

Instructio	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Delete text  Add text	The expression "highly improbable" has been used since the Sixth Revision of the ICD to indicate an unacceptable causal relationship. As a guide to the acceptability of sequences in the application of the General Principle and the selection rules, the following relationships should be regarded as "highly improbable":  (a) any infectious disease may be accepted as "due to" disorders of the immune mechanism such as human immunodeficiency virus [HIV] disease or AIDS;  (b) an infectious or parasitic disease (A00-B99) reported as "due to" any disease outside this chapter, except that:  • diarrhoca and gastroenteritis of )  presumed infectious origin (A09)  • septicaemia (A40-A41) ) may be accepted erysipelas (A46) ) as "due to" any  • gas gangrene (A48.0) ) disease  • Vincent's angina (A69.1) )  • mycoses (B35-B49) )  • any infectious disease may be accepted as "due to" immunosuppression by chemicals (chemotherapy) and radiation;  • any infectious disease classified to A00-B19 or B25-B64 reported as "due to" a malignant neoplasm will also be an acceptable sequence;  • varicella and zoster infections (B01-B02) may be accepted as "due to" diabetes, tuberculosis and lymphoproliferative neoplasms;  4.2.2 Highly improbable and acceptable sequences  The expression "highly improbable" has been used since the Sixth Revision of the ICD to indicate an unacceptable causal relationship. As a guide to the acceptability of sequences in the application of the General Principle and the selection rules, the following relationships should be regarded as "due to" any	0318		upuate	2010
	other disease or condition, except when reported as "due to" human				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	odeficiency virus [HIV] disease, malignant neoplasms and conditions				
	ng the immune system. 1-A03 (Typhoid and paratyphoid fevers, other salmonella infections,				
	gellosis)				
	5-A19 (Tuberculosis)				
	owing infectious and parasitic diseases should not be accepted as "due				
	other disease or condition (not even HIV/AIDS, malignant neoplasms				
	unosuppression) 0 (Cholera)				
	5.1 (Botulism)				
	0-A23 (Plague, tularaemia, anthrax, brucellosis)				
	7 (Leptospirosis)				
	3-A39 (Tetanus, diphtheria, whooping cough, scarlet fever,				
	ningococcal disease)				
	0 (Diseases due to Chlamydia psittaci)				
· · · · · · · · · · · · · · · · · · ·	5-A79 (Rickettsioses)				
	0 (Acute poliomyelitis)				
	1.0 Creutzfeldt-Jakob disease				
	1.1 Subacute sclerosing panencephalitis 2-A86 (Rabies, mosquito-borne viral encephalitis, tick-borne viral				
	ephalitis, unspecified viral encephalitis)				
	1-A92 (Dengue haemorrhagic and other mosquito-borne viral fevers				
	5 (Yellow fever)				
	6.0-A96.2 (Junin and Machupo haemorrhagic fevers, Lassa fever)				
• <u>A98</u>	8 (Other viral haemorrhagic fevers)				
• <u>B03</u>	3-B06 (Smallpox, monkeypox, measles, rubella)				
	6-B17.1 (Acute hepatitis B and C)				
	6 (Mumps)				
	0-B57 (Malaria, leishmaniasis, Chagas' disease)				
	O (Sequelae of tuberculosis)  1 (Sequelae of poliomyelitis)				
	2 (Sequelae of leprosy)				
	4.0 (Sequelae of trachoma)				
	4.1 (Sequelae of viral encephalitis)				
	4.2 (Sequelae of viral hepatitis)				
	ner emerging diseases reportable to WHO (e.g., U04 SARS, J09 Avian				

Instruction	n Instruction manual entries	Source	e Date approved	Major/ Minor update	Implementati on date
Delete text and Add text	<u>flu)</u>				
	(c) (b) a malignant neoplasm reported should not be accepted as "due to" any other disease, except human immunodeficiency virus (HIV) disease;				
Delete text and Add text	(d) (c) haemophilia (D66, D67, D68.0-D68.2) reported should not be accepted as "due to" any other disease;				
	(e) (d) diabetes (E10-E14) reported should not be accepted as "due to" any other disease except:				
	• haemochromatosis (E83.1), • diseases of pancreas (K85-K86),				
Delete text and Add text	• pancreatic neoplasms (C25, D13.6, D13.7, D37.7), • malnutrition (E40-E46);				
Add text	(f) (e) rheumatic fever (I00-I02) or rheumatic heart disease (I05-I09) reported				
Delete text and Add text	should not be accepted as "due to" any disease other than scarlet fever (A38), streptococcal septicaemia (A40.0-), streptococcal sore throat (J02.0) and acute				
Add text	tonsillitis (J03); (g) (f) any-hypertensive conditions reported should not be accepted as "due to"				
	any neoplasm except: • endocrine neoplasms,				
Delete text and Add text	<ul><li>renal neoplasms,</li><li>carcinoid tumours;</li></ul>				
	(h) (g) chronic ischaemic heart disease (I20, I25) reported should not be accepted as "due to" any neoplasm;				
	(i) (h)(1) cerebrovascular diseases (I60-I69) reported should not be accepted as "due to" a disease of the digestive system (K00-K92),				
	(2) cerebral infarction due to thrombosis of precerebral arteries (I63.0)				
	cerebral infarction due to unspecified occlusion of precerebral arteries (I63.2) cerebral infarction due to thrombosis of cerebral arteries (I63.3)				
	cerebral infarction due to unspecified occlusion of cerebral arteries (I63.5) cerebral infarction due to cerebral venous thrombosis, nonpyogenic (I63.6)				
	other cerebral infarction (I63.8) cerebral infarction, unspecified (I63.9)				
	stroke, not specified as haemorrhage or infarction (I64) other cerebrovascular diseases (I67)				
Delete text and	sequelae of stroke, not specified as haemorrhage or infarction (I69.4)				
Add text	sequelae of other and unspecified cerebrovascular diseases (I69.8)  reported should not be accepted as "due to" endocarditis (I05-I08, I09.1,				
	I33-I38), (3) occlusion and stenosis of precerebral arteries, not resulting in cerebral				

Instructio	n Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	infarction (I65), <i>except</i> embolism occlusion and stenosis of cerebral arteries, not resulting in cerebral				
Delete text and	infarction (I66), <i>except</i> embolism				
Add text	sequelae of cerebral infarction (I69.3), <i>except</i> embolism				
	reported should not be accepted as "due to" endocarditis (I05-I08, I09.1,				
Delete text and Add text	I33-I38);				
	(j) (i) any condition described as arteriosclerotic [atherosclerotic] reported				
Delete text and	should not be accepted as "due to" any neoplasm;				
Add text	(k) (j) influenza (J10-J11) reported should not be accepted as "due to" any other disease;				
ridd tont	(1) (k) a congenital anomaly (Q00-Q99) reported should not be accepted as				
	"due to" any other disease of the individual, including immaturity except for:				
	• a congenital anomaly should be accepted as "due to" a chromosome				
Dilitirate de la l	abnormality or a congenital malformation syndrome,				
Delete text and Add text	• pulmonary hypoplasia should be accepted as "due to" a congenital anomaly;				
Add text	(m) (l) a condition of stated date of onset "X" reported should not be accepted				
Delete text and	as "due to" a condition of stated date of onset "Y", when "X" predates "Y" (but				
Add text	see also Example 5 in section 4.1.6);				
	(n) (m) accidents (V01-X59) reported should not be accepted as due to any				
	other cause outside this chapter except:				
	(1) any accident (V01-X59) reported should be accepted as due to epilepsy (G40-G41),				
	(2) a fall (W00-W19) due to a disorder of bone density (M80-M85),				
Delete text and	(3) a fall (W00-W19) due to a (pathological) fracture caused by a disorder				
Add text	of bone density,				
	(4) asphyxia reported should be accepted as due to aspiration of mucus,				
Dalata tant and	blood (W80) or vomitus (W78) as a result of disease conditions,				
Delete text and Add text	(5) aspiration of food (liquid or solid) of any kind (W79) reported should be accepted as due to a disease which affects the ability to swallow;				
Add text	(o) (n) suicide (X60-X84) reported should not be accepted as "due to" any				
	other cause.				
	The above list does not cover all "highly improbable" sequences, but in other				
	cases, the General Principle should be followed unless otherwise indicated.				
	B. Acceptable sequences				

Instruction	Instruction manual entries	Source	Date	approved	Major/ Minor update	Implementati on date
Т	The following are acceptable sequences:					
	The following are acceptable sequences:  (a) infectious diseases other than those noted in 4.2.2 A.(a) reported as "due to" other conditions;  (b) The following infectious diseases when reported as "due to" human mmunodeficiency virus [HIV] disease, malignant neoplasms and conditions mpairing the immune system.  • A01-A03 (Typhoid and paratyphoid fevers, other salmonella infections, shigellosis)  • A15-A19 (Tuberculosis)  (c) a malignant neoplasm reported as "due to" human immunodeficiency virus (HIV) disease;  (d) diabetes (E10-E14) reported as "due to":  • haemochromatosis (E83.1),  • diseases of pancreas (K85-K86),  • pancreatic neoplasms (C25, D13.6, D13.7, D37.7),  • malnutrition (E40-E46);  (e) rheumatic fever (100-102) or rheumatic heart disease (105-109) reported as "due to" scarlet fever (A38), streptococcal septicaemia (A40.0-), streptococcal sore throat (J02.0) and acute tonsillitis (J03);  (f) any hypertensive condition reported as "due to":  • endocrine neoplasms,  • carcinoid tumours;  (g) occlusion and stenosis of precerebral arteries, not resulting in embolism occlusion and stenosis of cerebral arteries, not resulting in embolism sequelae of cerebral infarction (I69.3), embolism  reported as "due to" endocarditis (I05-I08, I09.1, I33-I38);	Source	Date	approved	Minor	
	(1) a congenital anomaly reported as "due to" a chromosome abnormality or a congenital malformation syndrome, (2) pulmonary hypoplasia reported as "due to" a congenital anomaly;					
	(1) any accident (V01-X59) reported as due to epilepsy (G40-G41), (2) a fall (W00-W19) due to a disorder of bone density (M80-M85), (3) a fall (W00-W19) due to a (pathological) fracture caused by a disorder of bone density, (4) asphyxia reported as due to aspiration of mucus, blood (W80) or vomitus					

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	(W78) as a result of disease conditions, (5) aspiration of food (liquid or solid) of any kind (W79) reported as due to a disease which affects the ability to swallow; (j) Acute or terminal circulatory diseases reported as due to malignant neoplasm, diabetes or asthma should be accepted as possible sequences in Part I of the certificate. The following conditions are regarded as acute or terminal circulatory diseases:  I21-I22 Acute myocardial infarction I24 Other acute ischaemic heart diseases I26 Pulmonary embolism I30 Acute pericarditis I33 Acute and subacute endocarditis I40 Acute myocarditis				
	I44 Atrioventricular and left bundle-branch block I45 Other conduction disorders I46 Cardiac arrest I47 Paroxysmal tachycardia I48 Atrial fibrillation and flutter I49 Other cardiac arrhythmias I50 Heart failure I51.8 Other ill-defined heart diseases I60-I68 Cerebrovascular diseases except I67.0-I67.5 and I67.9				
Page 68 Add	<ul> <li>4.2.2 Interpretation of "highly improbable"As a guide to the acceptability of sequences in the application of the General Principle and the selection rules, the following relationships should be regarded as "highly improbable": (n) suicide (X60-X84) reported as "due to" any other cause.</li> </ul>	MRG 0050	October 2000	Major	January 2003
Page 68	<b>4.2.2.</b> Interpretation of "highly improbable" (1) a condition of stated date of onset "X" reported as "due to" a condition of stated due of onset "Y", when "X" predates "Y" (but see also Example 5 in section 4.1.6);	MRG 0104	October 2001	Minor	January 2003
Page 68  Replace existing point	<b>4.2.2 Interpretation of "highly improbable"</b> As a guide to the acceptability of sequences in the application of the General Principle and the selection rules, the following relationships should be regarded as "highly improbable":	MRG 0049	October 2001	Minor	January 2003

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
(m) with this revised rule	(m) accidents (V01-X59) reported as due to any cause outside this chapter except:  (1) any accident (V01-X59) reported as due to epilepsy (G40-G41), (2) a fall (W00-W19) due to a disorder of bone density (M80-M85), (3) a fall (W00-W19) due to a (pathological) fracture caused by a disorder of bone density, (4) asphyxia reported as due to aspiration of mucus, blood (W80) or vomitus (W78) as a result of disease conditions, (5) aspiration of food (liquid or solid) of any kind (W79) reported as due to a disease which affects the ability to swallow;				
Page 67	<b>4.2.2 Interpretation of "highly improbable"</b> The expression "highly improbable"the following relationships should be regarded as "highly improbable":	MRG 0108	October 2001	Major	January 2003
Add new item (a)	(a) any infectious disease may be accepted as "due to" disorders of the immune mechanism such as human immunodeficiency virus [HIV] disease or AIDS;				
Renumber existing item (a) to item (b) and revise as indicated  Renumber the remaining existing items as appropriate	(b) an infectious or parasitic disease (A00-B99) reported as "due to" any disease outside this chapter, except that: . any infectious disease may be accepted as "due to" disorders of the immune mechanism such as human immunodeficiency virus [HIV] disease or AIDS; immunosuppression by chemicals (chemotherapy) and radiation. Any infectious disease classified to A00-B19 or B25-B64 reported as "due to" a malignant neoplasm will also be an acceptable sequence.  (c) a malignant neoplasm reported as "due to" any other disease, except human immunodeficiency virus [HIV] disease; (d) haemophilia (and so on)				
Page 67	4.2.2 Interpretation of "highly improbable"  The expression "highly improbable" has been used since the following relationships should be regarded as "highly improbable":	MRG 0122	October 2002	Minor	January 2004
	<ul> <li>(b) an infectious or parasitic disease (A00-B99) reported as "due to" any disease outside this chapter, except that:</li> <li>diarrhoea and gastroenteritis of presumed infectious origin (A09)</li> </ul>				

Instructi	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
Delete text as indicated Add text as indicated Add text as indicated	<ul> <li>septicaemia (A40-A41)</li> <li>erysipelas (A46)</li> <li>gas gangrene (A48.0)</li> <li>Vincent's angina (A69.1)</li> <li>mycoses (B35-B49)</li> <li>any infectious disease may be accepted as "due to" immunosuppression by chemicals (chemotherapy) and radiation. Any infectious disease classified to A00-B19 or B25-B64 reported as "due to" a malignant neoplasm will also be an acceptable sequence;</li> <li>any infectious disease classified to A00-B19 or B25-B64 reported as "due to" a malignant neoplasm will also be an acceptable sequence</li> <li>varicella and zoster infections (B01-B02) may be accepted as "due to" diabetes, tuberculosis and lymphoproliferative neoplasms;</li> <li>4.2.2 Interpretation of "highly improbable"</li> </ul>	MRG	October 2002	Minor	January
Delete existing text and replace with the following text	the following relationships should be regarded as "highly improbable": (i) any cerebrovascular disease (I60-I69) reported as "due to" a disease of the digestive system (K00-K92) or endocarditis (I05-I08, I09.1, I33-I38), except for cerebral embolism in I65-I66 or intracranial haemorrhage (I60-I62);  (i) (1) cerebrovascular diseases (I60-I69) reported as "due to" a disease of the digestive system (K00-K92). (2) cerebral infarction due to thrombosis of precerebral arteries (I63.0) cerebral infarction due to unspecified occlusion of precerebral arteries (I63.2) cerebral infarction due to thrombosis of cerebral arteries (I63.3) cerebral infarction due to unspecified occlusion of cerebral arteries (I63.5) cerebral infarction due to cerebral venous thrombosis, nonpyogenic (I63.6) other cerebral infarction (I63.8) cerebral infarction, unspecified (I63.9) stroke, not specified as haemorrhage or infarction (I64) other cerebrovascular diseases (I67) sequelae of stroke, not specified as haemorrhage or infarction (I69.4) sequelae of other and unspecified cerebrovascular diseases (I69.8)  reported as "due to" endocarditis (I05-I08, I09.1, I33-I38).  (3) occlusion and stenosis of precerebral arteries, not resulting in cerebral infarction (I65), except embolism	0119	October 2002	Willion	2004

Instruction	on Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
	occlusion and stenosis of cerebral arteries, not resulting in cerebral infarction  (I66), except embolism sequelae of cerebral infarction (I69.3), except embolism				
	reported as "due to" endocarditis (I05-I08, I09.1, I33-I38);				
Page 68	<b>4.2.2 Interpretation of "highly improbable"</b> the following relationships should be regarded as "highly improbable":	MRG 0118	October 2002	Major	January 2006
Revise text as shown	<ul> <li>(l) a congenital anomaly (Q00-Q99) reported as "due to" any other disease of the individual, including immaturity; except for:         <ul> <li>a congenital anomaly reported as "due to" a chromosome abnormality or a congenital malformation syndrome</li> <li>pulmonary hypoplasia reported as "due to" a congenital anomaly;</li> </ul> </li> </ul>				
p. 68	(e) diabetes (E10-E14) reported as "due to" any other disease, except for conditions causing damage to the pancreas. Note: A list of such conditions is available from the WHO Web site.	MRG 0319	October 2005	Major	January 2010
Add appendix	Insert new material in an appendix to Volume 2:				
	4.2.15 List of conditions that can cause diabetes				
	List of the conditions that can cause diabetes				
	Acceptable sequences for diabetes "due to" other diseases				
	Selected cause         As cause of           M35.9         E10, E14           E40-E46         E12, E14           B25.2         E13-E14           B26.3         E13-E14           C25         E13-E14				
	D13.6-D13.7       E13-E14         D35.0       E13-E14         E05- E06       E13-E14				
	E22.0 E13-E14 E24 E13 –E14				

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementati on date
E80.0- E80.2	E13-E14				
E83.1	E13-E14				
E84	E13-E14				
E89.1	E13-E14				
F10.1-F10.2	E13-E14				
<u>G</u> 10	E13-E14				
<u>G</u> 11.1	E13-E14				
<u>G25.8</u>	E13-E14				
<u>G71.1</u>	E13-E14				
<u>K85</u>	E13-E14				
<u>K86.0- K86.1</u>	E13-E14				
<u>K86.8- K86.9</u>	E13-E14				
<u>M35.9</u>	E13-E14				
<u>O24.4</u>	E13-E14				
P35.0	E13-E14				
Q87.1	E13-E14				
<u>Q</u> 90	E13-E14				
<u>Q</u> 96	E13-E14				
<u>Q</u> 98	E13-E14				
Q99.8	E13-E14				
S36.2	E13-E14				
<u>T37.3</u>	E13-E14				
<u>T37.5</u>	E13-E14				
<u>T38.0- T38.1</u>	E13-E14				
<u>T42.0</u>	E13-E14				
<u>T46.5</u>	E13-E14				
<u>T46.7</u>	E13-E14				
<u>T50.2</u>	E13-E14				
<u>X41</u>	E13-E14				
<u>X</u> 44	E13-E14				
<u>X61</u>	E13-E14				
<u>X64</u>	E13-E14				
<u>Y11</u>	E13-E14				
<u>Y14</u>	E13-E14				
<u>Y41.3</u>	E13-E14				
<u>Y41.5</u>	E13-E14				
<u>Y42.0- Y42.1</u>	E13-E14				
<u>Y46.2</u>	E13-E14				
<u>Y52.5</u>	E13 –E14				

Instruct	on Instruction manua	entries	Source	Date approved	Major/ Minor update	Implementati on date
	Y52.7         E13-E14           Y54.3         E13-E14					
p. 72  Revise text:	• erysipelas (A46)	as "due to" any disease outside  ay be accepted "due to" any sease  "immunosuppression by disease classified to A00-B19 or l also be an acceptable sequence. accepted as "due to" diabetes,  (I05-I09) reported as "due to" septicaemia-sepsis (A40),	MbRG 1238	October 2007	Major	January 2010

# Note 4.2.2 Interpretation of "highly" improbable for implementation January 2002 (incorporates URC No.0051)

#### 4.2.2 Interpretation of "highly improbable"

The expression "highly improbable" has been used since the Sixth Revision of the ICD to indicate an unacceptable causal relationship. As a guide to the acceptability of sequences in the application of the General Principle and the selection rules, the following relationships should be regarded as "highly improbable":

(a) an infectious or parasitic disease (A00-B99) reported as "due to" any disease outside this chapter, except that:

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diarrhoea and gastroenteritis of presumed infectious origin (A09) )
septicaemia (A40-A41) )
erysipelas (A46) ) may be accepted as "due to"
gas gangrene (A48.0) ) any other disease,
Vincent's angina (A69.1) )
mycoses (B35-B49)
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- any infectious disease may be accepted as "due to" disorders of the immune mechanism such as human immunodeficiency virus [HIV] disease or AIDS; immunosuppression by chemicals (chemotherapy) and radiation. Any infectious disease classified to A00-B19 or B25-B64 reported as "due to" a malignant neoplasm will also be an acceptable sequence,
- varicella and zoster infections (B01-B02) may be accepted as "due to" diabetes, tuberculosis and lymphoproliferative neoplasms;
- (b) a malignant neoplasm reported as "due to" any other disease, except human immunodeficiency virus (HIV) disease;
- (c) haemophilia (D66, D67, D68.0-D68.2) reported as "due to" any other disease;
- (d) diabetes (E10-E14) reported as "due to" any other disease except:
  - haemochromatosis (E83.1),
  - diseases of pancreas (K85-K86),
  - pancreatic neoplasms (C25.-, D13.6, D13.7, D37.7),
  - malnutrition (E40-E46);
- (e) rheumatic fever (I00-I02) or rheumatic heart disease (I05-I09) reported as "due to" any disease other than scarlet fever (A38), streptococcal septicaemia (A40.0-), streptococcal sore throat (J02.0) and acute tonsillitis (J03.-);
- (f) any hypertensive condition reported as "due to" any neoplasm except:
  - endocrine neoplasms,
  - renal neoplasms,
  - carcinoid tumours;
- (g) chronic ischaemic heart disease (I20, I25) reported as "due to" any neoplasm;
- (h) any cerebrovascular disease (I60-I69) reported as "due to" a disease of the digestive system (K00-K92) or endocarditis (I05-I08, I09.1, I33-I38), except for cerebral embolism in I65-I66 or intracranial haemorrhage (I60-I62);
- (i) any condition described as arteriosclerotic [atherosclerotic] reported as "due to" any neoplasm;
- (j) influenza (J10-J11) reported as "due to" any other disease;
- (k) a congenital anomaly (Q00-Q99) reported as "due to" any other disease of the individual, including immaturity;
- (l) a condition of stated date of onset "X" reported as "due to" a condition of stated date of onset "Y", when "X" predates "Y";
- (m) any accident (V01-X59) reported as due to any other cause outside this chapter except epilepsy (G40-G41).

The above list does not cover all "highly improbable" sequences, but in other cases, the General Principle should be followed unless otherwise indicated.

Acute or terminal circulatory diseases reported as due to malignant neoplasm, diabetes or asthma should be accepted as possible sequences in Part I of the certificate. The following conditions are regarded as acute or terminal circulatory diseases:

- I21-I22 Acute myocardial infarction
- I24.- Other acute ischaemic heart diseases
- I26.- Pulmonary embolism
- I30.- Acute pericarditis
- I33.- Acute and subacute endocarditis
- I40.- Acute myocarditis
- I44.- Atrioventricular and left bundle-branch block
- I45.- Other conduction disorders
- I46.- Cardiac arrest
- I47.- Paroxysmal tachycardia
- I48 Atrial fibrillation and flutter
- I49.- Other cardiac arrhythmias
- I50.- Heart failure
- I51.8 Other ill-defined heart diseases
- I60-I68 Cerebrovascular diseases except I67.0-I67.5 and I67.9

# Note 4.2.2 Interpretation of "highly" improbable for implementation January 2003 (incorporates URC Nos. 0049, 0050, 0051, 0104, 0108)

#### 4.2.2 Interpretation of "highly improbable"

The expression "highly improbable" has been used since the Sixth Revision of the ICD to indicate an unacceptable causal relationship. As a guide to the acceptability of sequences in the application of the General Principle and the selection rules, the following relationships should be regarded as "highly improbable":

- (a) any infectious disease may be accepted as "due to" disorders of the immune mechanism such as human immunodeficiency virus [HIV] disease or AIDS;
- (b) an infectious or parasitic disease (A00-B99) reported as "due to" any disease outside this chapter, except that:
  - diarrhoea and gastroenteritis of presumed infectious origin (A09) )
    septicaemia (A40-A41) )
    erysipelas (A46) ) may be accepted as "due to"
    gas gangrene (A48.0) ) any other disease,
    Vincent's angina (A69.1) )
    mycoses (B35-B49) )
  - any infectious disease may be accepted as "due to" immunosuppression by chemicals (chemotherapy) and radiation. Any infectious disease classified to A00-B19 or B25-B64 reported as "due to" a malignant neoplasm will also be an acceptable sequence,
  - varicella and zoster infections (B01-B02) may be accepted as "due to" diabetes, tuberculosis and lymphoproliferative neoplasms;
- (c) a malignant neoplasm reported as "due to" any other disease, except human immunodeficiency virus (HIV) disease;
- (d) haemophilia (D66, D67, D68.0-D68.2) reported as "due to" any other disease;
- (e) diabetes (E10-E14) reported as "due to" any other disease except:
  - haemochromatosis (E83.1),
  - diseases of pancreas (K85-K86),
  - pancreatic neoplasms (C25.-, D13.6, D13.7, D37.7),
  - malnutrition (E40-E46);
- (f) rheumatic fever (I00-I02) or rheumatic heart disease (I05-I09) reported as "due to" any disease other than scarlet fever (A38), streptococcal septicaemia (A40.0-), streptococcal sore throat (J02.0) and acute tonsillitis (J03.-);
- (g) any hypertensive condition reported as "due to" any neoplasm except:
  - endocrine neoplasms,
  - renal neoplasms,
  - carcinoid tumours;
- (h) chronic ischaemic heart disease (I20, I25) reported as "due to" any neoplasm;
- (i) any cerebrovascular disease (I60-I69) reported as "due to" a disease of the digestive system (K00-K92) or endocarditis (I05-I08, I09.1, I33-I38), except for cerebral embolism in I65-I66 or intracranial haemorrhage (I60-I62);
- (j) any condition described as arteriosclerotic [atherosclerotic] reported as "due to" any neoplasm;
- (k) influenza (J10-J11) reported as "due to" any other disease;
- (l) a congenital anomaly (Q00-Q99) reported as "due to" any other disease of the individual, including immaturity;
- (m) a condition of stated date of onset "X" reported as "due to" a condition of stated date of onset "Y", when "X" predates "Y" (but see also Example 5 in section 4.1.6);
- (n) accidents (V01-X59) reported as due to any other cause outside this chapter except:
  - (1) any accident (V01-X59) reported as due to epilepsy (G40-G41),
  - (2) a fall (W00-W19) due to a disorder of bone density (M80-M85),

- (3) a fall (W00-W19) due to a (pathological) fracture caused by a disorder of bone density,
- (4) asphyxia reported as due to aspiration of mucus, blood (W80) or vomitus (W78) as a result of disease conditions,
- (5) aspiration of food (liquid or solid) of any kind (W79) reported as due to a disease which affects the ability to swallow;
- (o) suicide (X60-X84) reported as "due to" any other cause.

The above list does not cover all "highly improbable" sequences, but in other cases, the General Principle should be followed unless otherwise indicated.

Acute or terminal circulatory diseases reported as due to malignant neoplasm, diabetes or asthma should be accepted as possible sequences in Part I of the certificate. The following conditions are regarded as acute or terminal circulatory diseases:

- I21-I22 Acute myocardial infarction
- I24.- Other acute ischaemic heart diseases
- I26.- Pulmonary embolism
- I30.- Acute pericarditis
- I33.- Acute and subacute endocarditis
- I40.- Acute myocarditis
- I44.- Atrioventricular and left bundle-branch block
- I45.- Other conduction disorders
- I46.- Cardiac arrest
- I47.- Paroxysmal tachycardia
- I48 Atrial fibrillation and flutter
- I49.- Other cardiac arrhythmias
- I50.- Heart failure
- I51.8 Other ill-defined heart diseases
- I60-I68 Cerebrovascular diseases except I67.0-I67.5 and I67.9

# Note 4.2.2 Interpretation of "highly" improbable for implementation January 2004 (incorporates URC Nos. 0049, 0050, 0051, 0104, 0108, 0119, 0122)

#### 4.2.2 Interpretation of "highly improbable"

The expression "highly improbable" has been used since the Sixth Revision of the ICD to indicate an unacceptable causal relationship. As a guide to the acceptability of sequences in the application of the General Principle and the selection rules, the following relationships should be regarded as "highly improbable":

- (a) any infectious disease may be accepted as "due to" disorders of the immune mechanism such as human immunodeficiency virus [HIV] disease or AIDS;
- (b) an infectious or parasitic disease (A00-B99) reported as "due to" any disease outside this chapter, except that:

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diarrhoea and gastroenteritis of presumed infectious origin (A09)
septicaemia (A40-A41)
erysipelas (A46)
gas gangrene (A48.0)
Vincent's angina (A69.1)
mycoses (B35-B49)
might a dispersion origin (A09)
may be accepted as "due to" any other disease,
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- any infectious disease may be accepted as "due to" immunosuppression by chemicals (chemotherapy) and radiation.
- any infectious disease classified to A00-B19 or B25-B64 reported as "due to" a malignant neoplasm will also be an acceptable sequence,
- varicella and zoster infections (B01-B02) may be accepted as "due to" diabetes, tuberculosis and lymphoproliferative neoplasms;
- (c) a malignant neoplasm reported as "due to" any other disease, except human immunodeficiency virus (HIV) disease;
- (d) haemophilia (D66, D67, D68.0-D68.2) reported as "due to" any other disease;
- (e) diabetes (E10-E14) reported as "due to" any other disease except:
  - haemochromatosis (E83.1),
  - diseases of pancreas (K85-K86),
  - pancreatic neoplasms (C25.-, D13.6, D13.7, D37.7),
  - malnutrition (E40-E46);
- (f) rheumatic fever (I00-I02) or rheumatic heart disease (I05-I09) reported as "due to" any disease other than scarlet fever (A38), streptococcal septicaemia (A40.0-), streptococcal sore throat (J02.0) and acute tonsillitis (J03.-);
- (g) any hypertensive condition reported as "due to" any neoplasm except:
  - endocrine neoplasms,
  - renal neoplasms,
  - carcinoid tumours;
- (h) chronic ischaemic heart disease (I20, I25) reported as "due to" any neoplasm;

(i)

- (1) cerebrovascular diseases (I60-I69) reported as "due to" a disease of the digestive system (K00-K92),
- (2) cerebral infarction due to thrombosis of precerebral arteries (I63.0) cerebral infarction due to unspecified occlusion of precerebral arteries (I63.2) cerebral infarction due to thrombosis of cerebral arteries (I63.3) cerebral infarction due to unspecified occlusion of cerebral arteries (I63.5) cerebral infarction due to cerebral venous thrombosis, nonpyogenic (I63.6) other cerebral infarction (I63.8) cerebral infarction, unspecified (I63.9)

stroke, not specified as haemorrhage or infarction (I64) other cerebrovascular diseases (I67) sequelae of stroke, not specified as haemorrhage or infarction (I69.4) sequelae of other and unspecified cerebrovascular diseases (I69.8)

reported as "due to" endocarditis (I05-I08, I09.1, I33-I38),

(3) occlusion and stenosis of precerebral arteries, not resulting in cerebral infarction (I65), *except* embolism occlusion and stenosis of cerebral arteries, not resulting in cerebral infarction (I66), *except* embolism sequelae of cerebral infarction (I69.3), *except* embolism

reported as "due to" endocarditis (I05-I08, I09.1, I33-I38);

- (j) any condition described as arteriosclerotic [atherosclerotic] reported as "due to" any neoplasm;
- (k) influenza (J10-J11) reported as "due to" any other disease;
- (1) a congenital anomaly (Q00-Q99) reported as "due to" any other disease of the individual, including immaturity;
- (m) a condition of stated date of onset "X" reported as "due to" a condition of stated date of onset "Y", when "X" predates "Y" (but see also Example 5 in section 4.1.6);
- (n) accidents (V01-X59) reported as due to any other cause outside this chapter except:
  - (1) any accident (V01-X59) reported as due to epilepsy (G40-G41),
  - (2) a fall (W00-W19) due to a disorder of bone density (M80-M85),
  - (3) a fall (W00-W19) due to a (pathological) fracture caused by a disorder of bone density,
  - (4) asphyxia reported as due to aspiration of mucus, blood (W80) or vomitus (W78) as a result of disease conditions,
  - (5) aspiration of food (liquid or solid) of any kind (W79) reported as due to a disease which affects the ability to swallow;
- (o) suicide (X60-X84) reported as "due to" any other cause.

The above list does not cover all "highly improbable" sequences, but in other cases, the General Principle should be followed unless otherwise indicated.

Acute or terminal circulatory diseases reported as due to malignant neoplasm, diabetes or asthma should be accepted as possible sequences in Part I of the certificate. The following conditions are regarded as acute or terminal circulatory diseases:

I21-I22	Acute myocardial infarction	I46	Cardiac arrest
I24	Other acute ischaemic heart diseases	I47	Paroxysmal tachycardia
I26	Pulmonary embolism	I48	Atrial fibrillation and flutter
I30	Acute pericarditis	I49	Other cardiac arrhythmias
I33	Acute and subacute endocarditis	I50	Heart failure
I40	Acute myocarditis	I51.8	Other ill-defined heart diseases
I44	Atrioventricular and left bundle-branch block	I60-I68	Cerebrovascular diseases except I67.0-I67.5 and I67.9
I45	Other conduction disorders		

# Note 4.2.2 Interpretation of "highly" improbable for implementation January 2006 (incorporates URC Nos. 0049, 0050, 0051, 0104, 0108, 0118, 0119, 0122)

#### 4.2.2 Interpretation of "highly improbable"

The expression "highly improbable" has been used since the Sixth Revision of the ICD to indicate an unacceptable causal relationship. As a guide to the acceptability of sequences in the application of the General Principle and the selection rules, the following relationships should be regarded as "highly improbable":

- (a) any infectious disease may be accepted as "due to" disorders of the immune mechanism such as human immunodeficiency virus [HIV] disease or AIDS;
- (b) an infectious or parasitic disease (A00-B99) reported as "due to" any disease outside this chapter, except that:
  - diarrhoea and gastroenteritis of presumed infectious origin (A09) )
    septicaemia (A40-A41) )
    erysipelas (A46) ) may be accepted as "due to"
    gas gangrene (A48.0) ) any other disease,
    Vincent's angina (A69.1) )
    mycoses (B35-B49)
  - any infectious disease may be accepted as "due to" immunosuppression by chemicals (chemotherapy) and radiation.
  - any infectious disease classified to A00-B19 or B25-B64 reported as "due to" a malignant neoplasm will also be an acceptable sequence,
  - varicella and zoster infections (B01-B02) may be accepted as "due to" diabetes, tuberculosis and lymphoproliferative neoplasms;
- (c) a malignant neoplasm reported as "due to" any other disease, except human immunodeficiency virus (HIV) disease;
- (d) haemophilia (D66, D67, D68.0-D68.2) reported as "due to" any other disease;
- (e) diabetes (E10-E14) reported as "due to" any other disease except:
  - haemochromatosis (E83.1),
  - diseases of pancreas (K85-K86),

other cerebral infarction (I63.8)

- pancreatic neoplasms (C25.-, D13.6, D13.7, D37.7),
- malnutrition (E40-E46);
- (f) rheumatic fever (I00-I02) or rheumatic heart disease (I05-I09) reported as "due to" any disease other than scarlet fever (A38), streptococcal septicaemia (A40.0-), streptococcal sore throat (J02.0) and acute tonsillitis (J03.-);
- (g) any hypertensive condition reported as "due to" any neoplasm except:
  - endocrine neoplasms,
  - renal neoplasms,
  - carcinoid tumours;
- (h) chronic ischaemic heart disease (I20, I25) reported as "due to" any neoplasm;
  - )
  - cerebrovascular diseases (I60-I69) reported as "due to" a disease of the digestive system (K00-K92),
     cerebral infarction due to thrombosis of precerebral arteries (I63.0)
  - cerebral infarction due to unspecified occlusion of precerebral arteries (I63.2) cerebral infarction due to thrombosis of cerebral arteries (I63.3) cerebral infarction due to unspecified occlusion of cerebral arteries (I63.5) cerebral infarction due to cerebral venous thrombosis, nonpyogenic (I63.6)

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cerebral infarction, unspecified (I63.9) stroke, not specified as haemorrhage or infarction (I64) other cerebrovascular diseases (I67) sequelae of stroke, not specified as haemorrhage or infarction (I69.4) sequelae of other and unspecified cerebrovascular diseases (I69.8) reported as "due to" endocarditis (I05-I08, I09.1, I33-I38),
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(3) occlusion and stenosis of precerebral arteries, not resulting in cerebral infarction (I65), *except* embolism occlusion and stenosis of cerebral arteries, not resulting in cerebral infarction (I66), *except* embolism sequelae of cerebral infarction (I69.3), *except* embolism

reported as "due to" endocarditis (I05-I08, I09.1, I33-I38);

- (j) any condition described as arteriosclerotic [atherosclerotic] reported as "due to" any neoplasm;
- (k) influenza (J10-J11) reported as "due to" any other disease;
- (l) a congenital anomaly (Q00-Q99) reported as "due to" any other disease of the individual, except for:
  - a congenital anomaly reported as "due to" a chromosome abnormality or a congenital malformation syndrome,
  - pulmonary hypoplasia reported as "due to" a congenital anomaly;
- (m) a condition of stated date of onset "X" reported as "due to" a condition of stated date of onset "Y", when "X" predates "Y" (but see also Example 5 in section 4.1.6):
- (n) accidents (V01-X59) reported as due to any other cause outside this chapter except:
  - (1) any accident (V01-X59) reported as due to epilepsy (G40-G41),
  - (2) a fall (W00-W19) due to a disorder of bone density (M80-M85),
  - (3) a fall (W00-W19) due to a (pathological) fracture caused by a disorder of bone density,
  - (4) asphyxia reported as due to aspiration of mucus, blood (W80) or vomitus (W78) as a result of disease conditions,
  - (5) aspiration of food (liquid or solid) of any kind (W79) reported as due to a disease which affects the ability to swallow;
- (o) suicide (X60-X84) reported as "due to" any other cause.

The above list does not cover all "highly improbable" sequences, but in other cases, the General Principle should be followed unless otherwise indicated.

Acute or terminal circulatory diseases reported as due to malignant neoplasm, diabetes or asthma should be accepted as possible sequences in Part I of the certificate. The following conditions are regarded as acute or terminal circulatory diseases:

I21-I22	Acute	mv	ocard	ial	inf	arction	

I24.- Other acute ischaemic heart diseases

I26.- Pulmonary embolism

I30.- Acute pericarditis

I33.- Acute and subacute endocarditis

I40.- Acute myocarditis

I44.- Atrioventricular and left bundle-branch block

I45.- Other conduction disorders

I46.- Cardiac arrest

I47.- Paroxysmal tachycardia

Atrial fibrillation and flutter

I49.- Other cardiac arrhythmias

I50.- Heart failure

I51.8 Other ill-defined heart diseases

I60-I68 Cerebrovascular diseases except I67.0-I67.5 and I67.9

# Note 4.2.2 Interpretation of "highly" improbable for implementation January 2010 (incorporates URC 0318, 1038, 1130 and 1238)

# 4.2.2 Accepted and rejected sequences for the selection of underlying cause of death for mortality statistics

This section lists sequences of causes of death that should be accepted or rejected when selecting the underlying cause of death. The purpose of these lists is to produce the most useful mortality statistics possible. Thus, whether a sequence is listed as "rejected" or "accepted" may reflect interests of importance for public health rather than what is acceptable from a purely medical point of view. The following instructions always apply, therefore, whether the relationship is considered medically correct or not.

(j) Rejected sequences

When applying the General Principle and the selection rules, the following relationships should be rejected:

(j) Infectious diseases

The following infectious diseases should not be accepted as due to any other disease or condition, except when reported as due to human immunodeficiency virus [HIV] disease, malignant neoplasms and conditions impairing the immune system:

- typhoid and paratyphoid fevers, other salmonella infections, shigellosis (A01-A03)
- tuberculosis (A15-A19)

The following infectious and parasitic diseases should not be accepted as due to any other disease or condition (not even HIV/AIDS, malignant neoplasms or immunosuppression):

- cholera (A00)
- botulism (A05.1)
- plague, tularaemia, anthrax, brucellosis (A20-A23)
- leptospirosis (A27)
- tetanus, diphtheria, whooping cough, scarlet fever, meningococcal disease (A33-A39)
- diseases due to Chlamydia psittaci (A70)
- rickettsioses (A75-A79)
- acute poliomyelitis (A80)
- Creutzfeldt-Jakob disease (A81.0)
- subacute sclerosing panencephalitis (A81.1)
- rabies, mosquito-borne viral encephalitis, tick-borne viral encephalitis, unspecified viral encephalitis (A82-A86)
- dengue haemorrhagic and other mosquito-borne viral fevers (A91-A92)
- yellow fever (A95)
- Junin and Machupo haemorrhagic fevers, Lassa fever (A96.0-A96.2)

<sup>1</sup> The expression "highly improbable" was previously used in the ICD to indicate a causal relationship that was not to be accepted when applying the selection rules.

- other viral haemorrhagic fevers (A98)
- smallpox, monkeypox, measles, rubella (B03-B06)
- acute hepatitis B and C (B16-B17.1)
- mumps (B26)
- malaria, leishmaniasis, Chagas' disease (B50-B57)
- sequelae of tuberculosis (B90)
- sequelae of poliomyelitis (B91)
- sequelae of leprosy (B92)
- sequelae of trachoma (B94.0)
- sequelae of viral encephalitis (B94.1)
- sequelae of viral hepatitis (B94.2)
- other emerging diseases reportable to WHO (e.g., SARS, influenza due to avian influenza virus)

#### (b) Malignant neoplasms

A malignant neoplasm should not be accepted as due to any other disease, except human immunodeficiency virus (HIV) disease.

# I Haemophilia

Haemophilia (D66, D67, D68.0-D68.2) should not be accepted as due to any other disease.

#### (d) Diabetes

Diabetes (E10-E14) should not be accepted as due to any other disease except diseases causing damage to the pancreas.

#### (e) Rheumatic fever

Rheumatic fever (I00-I02) or rheumatic heart disease (I05-I09) should not be accepted as due to any disease except:

- scarlet fever (A38)
- streptococcal sepsis (A40.0-)
- streptococcal sore throat (J02.0)
- acute tonsillitis (J03.-)

# (f) Hypertension

Hypertensive conditions should not be accepted as due to any neoplasm *except*:

- endocrine neoplasms
- renal neoplasms
- carcinoid tumours

### (g) Chronic ischaemic heart disease

Chronic ischaemic heart disease (I20, I25) should not be accepted as due to any neoplasm.

#### (h) Cerebrovascular disease

(1) Cerebrovascular disease and diseases of the digestive system

Cerebrovascular diseases (I60-I69) should not be accepted as due to a disease of the digestive system (K00-K92), *except* cerebral haemorrhage (I61.-) due to diseases of liver (K70-K76).

(2) Cerebral infarction and endocarditis

The following cerebrovascular conditions should not be accepted as due to endocarditis (I05-I08, I09.1, I33-I38):

- cerebral infarction due to thrombosis of precerebral arteries (I63.0)
- cerebral infarction due to unspecified occlusion of precerebral arteries (I63.2)
- cerebral infarction due to thrombosis of cerebral arteries (I63.3)
- cerebral infarction due to unspecified occlusion of cerebral arteries (I63.5)
- cerebral infarction due to cerebral venous thrombosis, nonpyogenic (I63.6)
- other cerebral infarction (I63.8)
- cerebral infarction, unspecified (I63.9)
- stroke, not specified as haemorrhage or infarction (I64)
- other cerebrovascular diseases (I67)
- sequelae of stroke, not specified as haemorrhage or infarction (I69.4)
- sequelae of other and unspecified cerebrovascular diseases (I69.8)
- occlusion and stenosis of precerebral arteries, not resulting in cerebral infarction (I65), *except* embolism
- occlusion and stenosis of cerebral arteries, not resulting in cerebral
- infarction (I66), except embolism
- sequelae of cerebral infarction (I69.3), except embolism

#### (i) Atherlosclerosis

Any condition described as arteriosclerotic [atherosclerotic] should not be accepted as due to any neoplasm.

(j) Influenza

Influenza (J09-J11) should not be accepted as due to any other disease.

(k) Congenital anomalies

A congenital anomaly (Q00-Q99) should not be accepted as due to any other disease of the individual, including immaturity, except:

- a congenital anomaly should be accepted as due to a chromosome abnormality or a congenital malformation syndrome
- pulmonary hypoplasia should be accepted as due to a congenital anomaly

#### (1) Conflicting durations

A condition of stated date of onset "X" should not be accepted as due to a condition of stated date of onset "Y", when "X" predates "Y" (but see also Example 5 in section 4.1.6).

#### (m) Accidents

Accidents (V01-X59) should not be accepted as due to any other cause outside this chapter, except:

- any accident (V01-X59) should be accepted as due to epilepsy (G40-G41)
- a fall (W00-W19) should be accepted as due to a disorder of bone density (M80-M85)
- a fall (W00-W19) should be accepted as due to a (pathological) fracture caused by a disorder of bone density
- asphyxia caused by aspiration of mucus, blood (W80) or vomitus (W78) should be accepted as due to disease conditions
- aspiration of food (liquid or solid) of any kind (W79) should be accepted as due to a disease which affects the ability to swallow

#### (n) Suicide

Suicide (X60-X84) should not be accepted as due to any other cause.

The above list does not cover all sequences that should be rejected, but in other cases, the General Principle should be followed unless otherwise indicated.

#### B. Acceptable sequences

When applying the General Principle and the selection rules, the following relationships should be accepted:

(j) Infectious diseases due to other conditions

Infectious diseases other than those noted in 4.2.2 A.(a) should be accepted as due to other conditions.

#### (b) Infectious diseases due to HIV

The following infectious diseases should be accepted as due to human immunodeficiency virus [HIV] disease, malignant neoplasms and conditions impairing the immune system:

- typhoid and paratyphoid fevers, other salmonella infections, shigellosis (A01-A03)
- tuberculosis (A15-A19)

# I Malignancies and HIV

A malignant neoplasm should be accepted as due to human immunodeficiency virus (HIV) disease.

(d) Diabetes

Diabetes (E10-E14) should be accepted as due to diseases causing damage to the pancreas.

(e) Rheumatic fever

Rheumatic fever (I00-I02) or rheumatic heart disease (I05-I09) should be accepted as due to

- scarlet fever (A38)
- streptococcal sepsis (A40.0-)
- streptococcal sore throat (J02.0)
- acute tonsillitis (J03.-)

# (f) Hypertension

Any hypertensive condition should be accepted as due to:

- endocrine neoplasms
- renal neoplasms
- carcinoid tumours
- (g) Cerebrovascular diseases
  - cerebral haemorrhage (I61.-) should be accepted as due to diseases of liver (K70-K76)

Embolism causing:

- occlusion and stenosis of precerebral arteries (I65)
- occlusion and stenosis of cerebral arteries (I66)
- sequelae of cerebral infarction (I69.3)

should be accepted as due to endocarditis (I05-I08, I09.1, I33-I38).

- (h) Congenital anomalies
  - a congenital anomaly should be accepted as due to a chromosome abnormality or

a congenital malformation syndrome

- pulmonary hypoplasia should be accepted as due to a congenital anomaly
- (j) Accidents
- any accident (V01-X59) should be accepted as due to epilepsy (G40-G41)
- a fall (W00-W19) should be accepted as due to a disorder of bone density (M80-M85)
- a fall (W00-W19) should be accepted as due to a (pathological) fracture caused by a disorder of bone density
- asphyxia caused by aspiration of mucus, blood (W80) or vomitus (W78) should be accepted as due to disease conditions,
- aspiration of food (liquid or solid) of any kind (W79) should be accepted as due to a disease which affects the ability to swallow;

### (j) Acute or terminal circulatory diseases

Acute or terminal circulatory diseases reported as due to malignant neoplasm, diabetes or asthma should be accepted as possible sequences in Part I of the certificate. The following conditions are regarded as acute or terminal circulatory diseases:

- acute and subsequent myocardial infarction (I21-I22)
- other acute ischaemic heart diseases (I24)
- pulmonary embolism (I26)
- acute pericarditis (I30)
- acute and subacute endocarditis (I33)
- acute myocarditis (I40)
- atrioventricular and left bundle-branch block (I44)
- other conduction disorders (I45)
- cardiac arrest (I46)
- paroxysmal tachycardia (I47)
- atrial fibrillation and flutter (I48)
- other cardiac arrhythmias (I49)
- heart failure (I50)
- other ill-defined heart diseases (I51.8)
- cerebrovascular diseases in I60-I66, I676-I67.8 and I69

Add text p.72	(i) (1) cerebrovascular diseases (I60-I69) reported as "due to" a disease of the digestive system (K00-K92), except Cerebral haemorrhage (I61) due to Diseases of liver (K70-K76) (2) cerebral infarction due to thrombosis of precerebral arteries (I63.0) cerebral infarction due to unspecified occlusion of precerebral arteries (I63.2) cerebral infarction due to thrombosis of cerebral arteries (I63.3)	MRG 1038)	October 2006	Minor	January 2008
Move location of sequelae of TB and add mention of chronic forms of hepatitis to section 4.2.2 of ICD-10 volume 2	4.2.2 Accepted and rejected sequences for the selection of underlying cause of death for mortality statistics  This section lists sequences of causes of death that should be accepted or rejected when selecting the underlying cause of death. The purpose of these lists is to produce the most useful Thus, whether a sequence is listed as "rejected" or "accepted" may reflect interests of importance for public health rather than what is acceptable from a purely medical point of view always apply, therefore, whether the relationship is considered medically correct or not.  Rejected sequences  When applying the General Principle and the selection rules, the following relationships should be rejected:  (a) Infectious diseases  The following infectious diseases should not be accepted as due to any other disease or condition, except when reported as due to human immunodeficiency virus [HIV] disease, malignant impairing the immune system:  • typhoid and paratyphoid fevers, other salmonella infections, shigellosis (A01-A03)  • tuberculosis (A15-A19)  • sequelae of tuberculosis (B90)  The following infectious and parasitic diseases should not be accepted as due to any other disease or condition (not even HIV/AIDS, malignant neoplasms or immunosuppression):  • cholera (A00)  • botulism (A05.1)  • plague, tularaemia, anthrax, brucellosis (A20-A23)  • leptospirosis (A27)  • tetanus, diphtheria, whooping cough, scarlet fever, meningococcal disease (A33-A39)  • diseases due to Chlamydia psittaci (A70)	MRG 1798	October 2011	Minor	January 2013
	• rickettsioses (A75-A79) • acute poliomyelitis (A80) • Creutzfeldt-Jakob disease (A81.0)				

• tuberculosis (A15-A19, B90)

• subacute sclerosing panencephalitis (A81.1) • rabies, mosquito-borne viral encephalitis, tick-borne viral encephalitis, unspecified viral encephalitis (A82-A86) • dengue haemorrhagic and other mosquito-borne viral fevers (A91-A92) • yellow fever (A95) • Junin and Machupo haemorrhagic fevers, Lassa fever (A96.0-A96.2) • other viral haemorrhagic fevers (A98) • smallpox, monkeypox, measles, rubella (B03-B06) • acute hepatitis B and C (B16-B17.1) • chronic hepatitis B and C (B18.0-B18.2) • mumps (B26) • malaria, leishmaniasis, Chagas' disease (B50-B57) • sequelae of tuberculosis (B90) • sequelae of poliomyelitis (B91) • sequelae of leprosy (B92) • sequelae of trachoma (B94.0) • sequelae of viral encephalitis (B94.1) • sequelae of viral hepatitis (B94.2) • other emerging diseases reportable to WHO (e.g., SARS, influenza due to avian influenza virus) (b) Malignant neoplasms The above list does not cover all sequences that should be rejected, but in other cases, the General Principle should be followed unless otherwise indicated. B. Acceptable sequences When applying the General Principle and the selection rules, the following relationships should be accepted: (j) Infectious diseases due to other conditions Infectious diseases other than those noted in 4.2.2 A.(a) should be accepted as due to other conditions. (b) Infectious diseases due to HIV The following infectious diseases should be accepted as due to human immunodeficiency virus [HIV] disease, malignant neoplasms and conditions impairing the immune system: • typhoid and paratyphoid fevers, other salmonella infections, shigellosis (A01-A03)

					1
	I Malignancies and HIV				
	A malignant neoplasm should be accepted as due to human immunodeficiency virus (HIV) disease.				
	1 The expression "highly improbable" was previously used in the ICD to indicate a causal relationship that was not to be accepted when applying the selection rules.				
	(j) Infectious diseases due to other conditions Infectious diseases other than those noted in 4.2.2 A.(a) should be accepted as due to other conditions.				
	(b) Infectious diseases due to HIV				
	The following infectious diseases should be accepted as due to human immunodeficiency virus [HIV] disease, malignant neoplasms and conditions impairing the immune system:				
	• typhoid and paratyphoid fevers, other salmonella infections, shigellosis (A01-A03) • tuberculosis (A15-A19, B90)				
	I Malignancies and HIV				
	A malignant neoplasm should be accepted as due to human immunodeficiency virus (HIV) disease.				
	1 The expression "highly improbable" was previously used in the ICD to indicate a causal relationship that was not to be accepted when applying the selection rules.				
Change the notes on	Section 4.2.2	MRG 1865	October 2011	Minor	January 2013
diabetes in 4.2.2 as follows:	A. Rejected sequences (d) Diabetes	1000			
Tollows.	Insulin-dependent dDiabetes mellitus (E10) (E10 E14) should not be accepted as "due to" any other disease except for conditions causing damage to the pancreas autoimmune				

destruction of β-cells.				
Non-insulin-dependent diabetes mellitus (E11) should not be accepted as "due to" any other disease <i>except</i> conditions causing insulin resistance.				
Other and unspecified diabetes mellitus (E13-E14) should not be accepted as "due to" any other disease <i>except</i> conditions causing damage to the pancreas.				
See Appendix 7.2 for a list of the conditions that can cause diabetes.				
B. Acceptable sequences (d) diabetes:  Insulin dependent dDiabetes mellitus(E10) (E10-E14) should be accepted as "due to" diseases causing damage to the pancreas autoimmune destruction of \( \beta - \text{cells} \).				
Non-insulin-dependent diabetes mellitus (E11) should be accepted as "due to" conditions causing insulin resistance.				
Other and unspecified diabetes mellitus (E13-E14) should be accepted as "due to" conditions causing damage to the pancreas.				
See Appendix 7.2 for a list of the conditions that can cause diabetes.				
4.2.2 Accepted and rejected sequences for the selection of underlying cause of death for mortality statistics	MRG 1969	October 2012	Major	January 2016
This section lists sequences of causes of death that should be accepted or rejected when selecting the underlying cause of death				
A. Rejected sequences				
When applying the General Principle and the selection rules, the following relationships should be rejected:				
(a) Infectious diseases				
The following infectious and parasitic diseases should not be accepted as due to any other disease or condition (not even HIV/AIDS, malignant neoplasms or immunosuppression):				

Add text	<ul> <li>leptospirosis (A27)</li> <li>leprosy (Hansen's disease) (A30)</li> <li>tetanus, diphtheria, whooping cough, scarlet fever, meningococcal disease (A33-A39)</li> <li>diseases due to Chlamydia psittaci (A70)</li> <li>trachoma (A71)</li> <li>rickettsioses (A75-A79)</li> </ul>				
Delete text	4.2.3 Effect of duration on classification  In evaluating the reported sequence This would apply in the interpretation of "highly improbable" relationships (see above) and in Modification Rule F (sequelae).	MRG 1791	October 2011	Major	January 2013
Delete text	4.2.4 Sequelae  Certain categories (B90-B94, E64, E68, G09, I69, O97 and Y85-Y87) are to be used for underlying cause mortality coding to indicate that death resulted from the late (residual effects of a given disease or injury rather than during the active phase. Modification Rule F applies in such circumstances. Conditions reported	MRG 1791	October 2011	Major	January 2013
Page 71  Add text	4.2.6 Operations  If an operation appears on the certificate as the cause of death without mention of the condition for which it was performed or of the findings at operation, and the alphabetical index does not provide a specific code for the operation, code to the residual category for the organ or site indicated by the name of the operation (e.g. code "nephrectomy" to N28.9). If the operation does not indicate an organ or site, e.g. "laparotomy", code to "Other ill-defined and unspecified causes or mortality" (R99), unless there is a mention of a therapeutic misadventure classifiable to Y60-Y84 or a postoperative complication. If there is mention of a misadventure at the time of the procedure, code to Y60-Y69. If there is a mention of an abnormal reaction of the patient, without mention of misadventure at the time of the procedure, code to Y83-Y84.	MRG 0164	October 2003	Major	January 2006
	<b>4.2.6 Operations</b> If an operation appears on the certificate as the cause of death without mention of the condition for which it was performed or of the findings at operation, and the alphabetical index does not provide a specific code for the operation, code to the residual category for the organ or site indicated by the name of the operation (e.g. code "nephrectomy" to N28.9). If	MRG 1061	October 2006	Major	January 2010

			1		<del>,                                      </del>
	the operation does not indicate an organ or site, e.g. "laparotomy", code to "Other ill-defined				
	and unspecified causes of mortality" (R99), unless there is a mention of a therapeutic				
	misadventure classifiable to Y60-Y84 or a postoperative complication. If there is mention of				
	a misadventure at the time of the procedure, code to Y60-Y69. If there is a mention of an				
	abnormal reaction of the patient, without mention of misadventure at the time of the				
	procedure, code to Y83-Y84.				
	Example: I (a) Pulmonary embolism				
	(b) Appendectomy				
	Code to unspecified disease of appendix (K38.9)				
	Example: I (a) Accidental puncture of aorta				
	(b) Laparotomy				
Add text	Code to unintentional puncture during surgical operation (Y60.)				
p. 76	Code complications of obstetrical surgery to the reason for the surgery. If no reason for the				
1	obstetrical surgery is stated, code to O75.4.				
	Example: I (a) Postoperative haemorrhage				
	(b) Caesarean section				
	(c) Prolonged labour				
	Code to long labour, unspecified (O63.9)				
	Example: I (a) Amniotic fluid embolism				
	(b) Caesarean section				
	Code to other complications of obstetric surgery and procedures (O75.4)				
	Source comprises of contents surgery and proceedings (C+e++)				
p 87	4.2.6 Operations	MbRG	October 2007	Minor	January 2009
PO	If an operation appears unless there is a mention of a therapeutic misadventure classifiable	1222	October 2007	Willion	Junuary 2009
	to <u>O74, O75.4</u> or Y60-Y84 or a postoperative complication If there is a mention of a	1222			
	misadventure at the time of the procedure, code to <b>O74</b> , <b>O75.4</b> or <b>Y60-Y69</b> . If there is a				
	mention of an abnormal reaction of the patient, without mention of misadventure at the time				
	of the procedure, code to <u>074</u> , <u>075.4</u> or <u>Y83-Y84</u> .				
	of the procedure, code to <u>074, 073.4</u> or 163-164.				
Modify text:	Whenever a complication of a procedure is not indexed or is not a synonym of an inclusion				
Modify text.	orindexed term, code early complications and mechanical complications to <b>T80-T88</b> . Code				
	late complications and functional complications to the appropriate system chapter.				
	late complications and functional complications to the appropriate system chapter.				
Revise and add	426 On suctions Complications of suscissional and modical cons	MRG	October 2009	Minor	January 2011
	4.2.6 Operations Complications of surgical and medical care		October 2009	Millor	January 2011
text	A. C. and and and an arranged and define a contract of the con	1474			
	A. Surgical and other procedures without mention of cause				
	If an annual and an additional annual and an additional and a second a				
	If an operation <u>or other medical procedure</u> appears on the certificate as the cause of death				
	without mention of misadventure at the time of the procedure, code to O74, O75.4 or Y83-				
	Y84.				

		I	1		
	D.M. P. J. J. P. Communication of the state				
	B. Medical devices associated with adverse incidents due to external causes classified				
	<u>elsewhere</u>				
	If a death is caused by an incident involving a medical device, but the incident is due to an				
	external cause classified elsewhere and not to any breakdown or malfunctioning of the				
	device itself, code to the external cause.				
	device itself, code to the external cause.				
	Ex xx: I(a) Inhalation pneumonia				
	(b) Hemorrhage of trachea				
	(c) Fell from bed while attached to respirator				
	II Respirator treatment following liver				
	transplant				
	<u>umspant</u>				
	Code to fall involving bed ( <b>W06</b> ). There is no mention of any breakdown or malfunctioning				
	of the respirator.				
	of the respirator.				
	Ex xx: I(a) Pulmonary edema				
	(b) Intra-aortic balloon pump stopped				
	(c) Power cut due to hurricane				
	(d) Recent myocardial infarction with mitral				
	insufficiency				
	· · · · · · · · · · · · · · · · · · ·				
	Code to victim of cataclysmic storm (X37). There is no indication of any malfunctioning of				
	the balloon pump.				
	If the external cause of the incident is not specifically classified, code to exposure to				
	unspecified factor causing other and unspecified injury (X59.9).				
	Ex xx: I(a) Cardiac and respiratory failure				
	(b) Stopped administration of inotrop drugs				
	(c) Accidental removal of subclavian line				
	II Surgery for acute rupture of gallbladder				
	Code to exposure to unspecified factor causing other and unspecified injury (X59.9), since				
TT1 0 11 1	accidental removal is not specifically classified.	7.00.0	0 1 2007	36.	Y 2010
The following	4.2.7 Malignant neoplasms	MRG	October 2007	Major	January 2010
strikes out the		1131			
current section	When a malignant neoplasm is considered to be the underlying cause of death, it is most				
for 4.2.7 and	important to determine the primary site. Morphology and behaviour should also be taken				
provides the	into consideration. Cancer is a generic term and may be used for any morphological group,				
suggested repl	although it is rarely applied to malignant neoplasms of lymphatic, haematopoietic and				

acement.

related tissues. Carcinoma is sometimes used incorrectly as a synonym for cancer. Some death certificates may be ambiguous if there was doubt about the site of the primary or imprecision in drafting the certificate. In these circumstances, if possible, the certifier should be asked to give clarification. Failing this, the guidelines given below should be observed. The morphological types of tumours classified in on pp. 1179-1204 of Volume 1 can be found in the Alphabetical Index with their morphology code and with an indication as to the coding by site.

#### A. Implication of malignancy

Mention on the certificate that a neoplasm has produced metastases (secondaries) means that it must be coded as malignant, even though this neoplasm without mention of metastases would be classified to some other section of Chapter II.

Example 1: I (a) Metastatic involvement of lymph nodes

(b) Carcinoma in situ of breast

Code to malignant neoplasm of breast (C50.9).

# B. Sites with prefixes or imprecise definitions

Neoplasms of sites prefixed by "peri", "para", "pre", "supra", "infra", etc. or described as in the "area" or "region" of a site, unless these terms are specifically indexed, should be coded as follows: for morphological types classifiable to one of the categories C40, C41 (bone and articular cartilage), C43 (malignant melanoma of skin), C44 (other malignant neoplasms of skin), C45 (mesothelioma), C47 (peripheral nerves and autonomic nervous system), C49 (connective and soft tissue), C70 (meninges), C71 (brain) and C72 (other parts of central nervous system), code to the appropriate subdivision of that category; otherwise code to the appropriate subdivision of C76 (other and ill defined sites).

Example 2: I (a) Fibrosarcoma in the region of the leg

Code to malignant neoplasm of connective and soft tissue of lower limb (C49.2).

# C. Malignant neoplasms of unspecified site with other reported conditions

When the site of a primary malignant neoplasm is not specified, no assumption of the site should be made from the location of other reported conditions such as perforation, obstruction, or haemorrhage. These conditions may arise in sites unrelated to the neoplasm, e.g. intestinal obstruction may be caused by the spread of an ovarian malignancy. Example 3: I (a) Obstruction of intestine

(b) Carcinoma

Code to malignant neoplasm without specification of site (C80).

#### D. Malignant neoplasms with primary site indicated

If a particular site is indicated as primary, it should be selected, regardless of the position on the certificate or whether in Part I or Part II. If the primary site is stated to be unknown, see E below. The primary site may be indicated in one of the following ways: The specification of one site as primary in either Part I or II. Example 4: I (a) Carcinoma of bladder Primary in kidney Code to malignant neoplasm of kidney (C64). (b) The specification of other sites as "secondary", "metastases", "spread" or "carcinomatosis". Example 5: I (a) Carcinoma of breast (b) Secondaries in brain Code to malignant neoplasm of breast (C50.9), since Rule 2 applies Morphology indicates a primary malignant neoplasm. If a morphological type implies a primary site, such as hepatoma, consider this as if the word "primary" had been included. Example 6: I (a) Metastatic carcinoma (b) Pseudomucinous adenocarcinoma Code to malignant neoplasm of ovary (C56), since pseudomucinous adenocarcinoma of unspecified site is assigned to the ovary in the Alphabetical Index. If two or more primary sites or morphologies are indicated, these should be coded according to sections F, G and H, below. E. Primary site unknown If the statement, "primary site unknown", or its equivalent, appears anywhere on a certificate, code to the category for unspecified site for the morphological type involved (e.g. adenocarcinoma C80, fibrosarcoma C49.9, osteosarcoma C41.9), regardless of the site(s) mentioned elsewhere on the certificate. Example 7: I (a) Secondary carcinoma of liver (b) Primary site unknown (c) ? Stomach ? Colon Code to carcinoma without specification of site (C80). Example 8: I (a) Generalized metastases (b) Melanoma of back (c) Primary site unknown Code to malignant melanoma of unspecified site (C43.9). F. Independent (primary) multiple sites (C97)

The presence of more than one primary neoplasm could be indicated by mention of two different anatomical sites or two distinct morphological types (e.g. hypernephroma and intraductal carcinoma), or by a mix of a morphological type that implies a specific site, plus a second site. It is highly improbable that one primary would be due to another primary malignant neoplasm except for the group of malignant neoplasms of lymphoid, haematopoietic and related tissue (C81-C96), within which one form of malignancy may terminate in another (e.g. leukaemia may follow non-Hodgkin's lymphoma). If two or more sites mentioned in Part I are in the same organ system, see section H. If the sites are not in the same organ system and there is no indication that any is primary or secondary, code to malignant neoplasms of independent (primary) multiple sites (C97), unless all are classifiable to C81-C96, or one of the sites mentioned is a common site of metastases or the lung (see G-below).

Example 9: I (a) Cancer of stomach

(b) Cancer of breast

Code to malignant neoplasms of independent (primary) multiple sites (C97), since two different anatomical sites are mentioned and it is unlikely that one primary malignant neoplasm would be due to another.

Example 10: I (a) Hodgkin's disease

(b) Carcinoma of bladder

Code to malignant neoplasms of independent (primary) multiple sites (C97), since two distinct morphological types are mentioned.

Example 11: I (a) Acute lymphocytic leukaemia

(b) Non Hodgkin's lymphoma

Code to non Hodgkin's lymphoma (C85.9), since both are classifiable to C81 C96 and the sequence is acceptable.

Example 12: I (a) Leukaemia

- (b) Non-Hodgkin's lymphoma
- (c) Carcinoma of ovary

Code to malignant neoplasms of independent (primary) multiple sites (C97), since, although two of the neoplasms are classifiable to C81 C96, there is mention of a site elsewhere.

Example 13: I (a) Leukaemia

II Carcinoma of breast

Code to leukaemia (C95.9) because the carcinoma of breast is in Part II. When dealing with multiple sites, only sites in Part I of the certificate should be considered (see H).

#### G. Metastatic neoplasms

When a malignant neoplasm spreads or metastasizes it generally retains the same morphology even though it may become less differentiated. Some metastases have such a characteristic microscopic appearance that the pathologist can infer the primary site with confidence, e.g. thyroid. Widespread metastasis of a carcinoma is often called carcinomatosis. If an unqualified nonspecific term such as carcinoma or sarcoma appears

with a term describing a more specific histology of the same broad group, code to the site of the more specific morphology, assuming the other to be metastatic. Although malignant cells can metastasize anywhere in the body, certain sites are more common than others and must be treated differently (see below). However, if one of these sites appears alone on a death certificate and is not qualified by the word "metastatic", it should be considered primary. Common sites of metastases Mediastinum Bone Brain-Meninges Peritoneum Diaphragm-Pleura Heart Liver Retroperitoneum Lung Spinal cord Lymph nodes Ill defined sites (sites classifiable to C76) - The lung poses special problems in that it is a common site for both metastases and primary malignant neoplasms. Lung should be considered as a common site of metastases whenever it appears with sites not on this list. However, when the bronchus or bronchogenic cancer is mentioned this neoplasm should be considered primary. If lung is mentioned and the only other sites are on the list of common sites of metastases, consider lung primary. Malignant neoplasm of lymph nodes not specified as primary should be assumed to be secondary. Example 14: I (a) Cancer of brain -Code to malignant neoplasm of brain (C71.9). Example 15: I (a) Cancer of bone (b) Metastatic carcinoma of lung Code to malignant neoplasm of lung (C34.9), since bone is on the list of common sites of metastases and lung can therefore be assumed to be primary. The adjective "metastatic" is used in two ways—sometimes meaning a secondary from a primary elsewhere and sometimes denoting a primary that has given rise to metastases. In order to avoid confusion, the following guidelines are proposed: Malignant neoplasm described as "metastatic from" a specified site should be interpreted as primary of that site. Example 16: I (a) Metastatic teratoma from ovary Code to malignant neoplasm of ovary (C56). (b) Malignant neoplasm described as "metastatic to" a site should be interpreted as secondary of that site unless the morphology indicates a specific primary site. Example 17: I (a) Metastatic carcinoma to the rectum Code to secondary malignant neoplasm of rectum (C78.5). The word "to" clearly indicates

rectum as secondary.

Example 18: I (a) Metastatic osteosarcoma to brain

Code to malignant neoplasm of bone (C41.9), since this is the unspecified site of osteosarcoma.

(c) A single malignant neoplasm described as "metastatic (of)".

The terms "metastatic" and "metastatic of" should be interpreted as follows:

(i) If one site is mentioned and this is qualified as metastatic, code to malignant primary of that particular site if no morphological type is mentioned and it is not a common metastatic site (see list of common sites of metastases given above).

Example 19: I (a) Cervical cancer, metastatic

Code to malignant neoplasm of cervix (C53.9).

(ii) If no site is reported but the morphological type is qualified as metastatic, code as for primary site unspecified of the particular morphological type involved.

Example 20: I (a) Metastatic oat cell carcinoma

Code to malignant neoplasm of lung (C34.9).

(iii) If a single morphological type and a site, other than a common metastatic site (see list given above), are mentioned as metastatic, code to the specific category for the morphological type and site involved.

# Example 21: I (a) Metastatic melanoma of arm

Code to malignant melanoma of skin of arm (C43.6), since in this case the ill defined site of arm is a specific site for melanoma, not a common site of metastases classifiable to C76.

(iv) If a single morphological type is mentioned as metastatic and the site mentioned is one of the common sites of metastases except lung, code to "unspecified site" for the morphological type, unless the unspecified site is classified to C80 (malignant neoplasm without specification of site), in which case code to secondary malignant neoplasm of the site mentioned.

Example 22: I (a) Metastatic osteosarcoma of brain

Code to malignant neoplasm of bone, unspecified (C41.9), since brain is on the list of common sites of metastases.

(v)—If one of the common sites of metastases, except lung, is described as metastatic and no other site or morphology is mentioned, code to secondary neoplasm of the site (C77—C79).

Example 23: I (a) Metastatic brain cancer

Code to secondary malignant neoplasm of brain (C79.3).

Example 24: I (a) Metastatic carcinoma of lung

Code to malignant neoplasm of lung (C34.9).

- (d) More than one malignant neoplasm qualified as metastatic.
- (i) If two or more sites with the same morphology, not on the list of common sites of metastases, are reported and all are qualified as "metastatic", code as for primary site unspecified of the anatomical system and of the morphological type involved.

Example 25: I (a) Metastatic carcinoma of prostate (b) Metastatic carcinoma of skin Code to malignant neoplasm without specification of site (C80), since metastatic carcinoma of prostate is not likely to be due to metastatic carcinoma of skin; both are probably due to spread from a malignant neoplasm of unknown primary site, which should have been entered on line (c). Example 26: I (a) Metastatic carcinoma of stomach (b) Metastatic carcinoma of breast (c) Metastatic carcinoma of lung Code to malignant neoplasm without specification of site (C80), since breast and stomach do not belong to the same anatomical system and lung is on the list of common sites of metastases. (ii) If two or more morphological types of different histological groups are qualified as metastatic, code to malignant neoplasms of independent (primary) multiple sites (C97) (see Example 27: I (a) Bowel obstruction (b) Metastatic adenocarcinoma of bowel -(c) Metastatic sarcoma of uterus Code to malignant neoplasms of independent (primary) multiple sites (C97). (iii) If a morphology implying site and an independent anatomical site are both qualified as metastatic, code to malignant neoplasm without specification of site (C80). Example 28: I (a) Metastatic colonic and renal cell Code to malignant neoplasm without specification of site (C80). (iv) If more than one site with the same morphology is mentioned and all but one are qualified as metastatic or appear on the list of common sites of metastases, code to the site that is not qualified as metastatic, irrespective of the order of entry or whether it is in Part I or Part II. If all sites are qualified as metastatic or on the list of common sites of metastases, including lung, code to malignant neoplasm without specification of site (C80). Example 29: I (a) Metastatic carcinoma of stomach (b) Carcinoma of gallbladder (c) Metastatic carcinoma of colon Code to malignant neoplasm of gallbladder (C23). Example 30: I (a) Metastatic carcinoma of ovary (b) Carcinoma of lung (c) Metastatic cervical carcinoma Code to malignant neoplasm without specification of site (C80). Example 31: I (a) Metastatic carcinoma of stomach (b) Metastatic carcinoma of lung II Carcinoma of colon Code to malignant neoplasm of colon (C18.9), since this is the only diagnosis not qualified

as metastatic, even though it is in Part II.

(v) If all sites mentioned are on the list of common sites of metastases, code to unknown primary site of the morphological type involved, unless lung is mentioned, in which case code to malignant neoplasm of lung (C34.).

Example 32: I (a) Cancer of liver

(b) Cancer of abdomen

Code to malignant neoplasm without specification of site (C80), since both are on the list of common sites of metastases. (Abdomen is one of the ill defined sites included in C76. .)

#### Example 33: I (a) Cancer of brain

(b) Cancer of lung

Code to cancer of lung (C34.9), since lung in this case is considered to be primary, because brain, the only other site mentioned, is on the list of common sites of metastases.

(vi) If only one of the sites mentioned is on the list of common sites of metastases or lung, code to the site not on the list.

Example 34: I (a) Cancer of lung

(b) Cancer of breast

Code to malignant neoplasm of breast (C50.9), since lung in this case is considered to be a metastatic site, because breast is not on the list of common sites of metastases.

(vii) If one or more of the sites mentioned is a common site of metastases (see list given above) but two or more sites or different morphological types are also mentioned, code to malignant neoplasms of independent (primary) multiple sites (C97) (see F above).

Example 35: I (a) Cancer of liver

- (b) Cancer of bladder
- (c) Cancer of colon

Code to malignant neoplasms of independent (primary) multiple sites (C97), since liver is on the list of common sites of metastases and there are still two other independent sites.

(viii) If there is a mixture of several sites qualified as metastatic and several other sites are mentioned, refer to the rules for multiple sites (see F above and H below).

#### H. Multiple sites

When dealing with multiple sites, only sites in Part I of the certificate should be considered. If malignant neoplasms of more than one site are entered on the certificate, the site listed as primary or not indicated whether primary or secondary should be selected (see D, E and F above).

Multiple sites with none specified as primary

(a) Notwithstanding the provisions of Rule H to consider only sites in Part I, if one of the common sites of metastases, excluding lung, and another site or morphological type are mentioned anywhere on the certificate, code to the other site. If, however, a malignant neoplasm of lymphatic, haematopoietic, or related tissue appears in Part II, only Part I

should be considered. Example 36: I (a) Cancer of stomach (b) Cancer of liver Code to malignant neoplasm of stomach (C16.9). Although the sequence suggests that the liver was the primary site, metastasis from liver—a common site of metastases—to stomach is improbable and it is assumed that the stomach cancer metastasized to the liver. Example 37: I (a) Peritoneal cancer Mammary carcinoma Code to malignant neoplasm of breast (C50.9), since the peritoneal cancer is presumed secondary because it is on the list of common sites of metastases. Malignant neoplasms described as one site "or" another, or if "or" is implied, should be coded to the category that embraces both sites. If no appropriate category exists, code to the unspecified site of the morphological type involved. This rule applies to all sites whether they are on the list of common sites of metastases or not. Example 38: I (a) Carcinoma of ascending or descending colon Code to malignant neoplasm of colon, unspecified (C18.9). Example 39: I (a) Osteosarcoma of lumbar vertebrae or sacrum Code to malignant neoplasm of bone, unspecified (C41.9). If two or more morphological types of malignant neoplasm occur in lymphoid, haematopoietic or related tissue (C81 C96), code according to the sequence given since these neoplasms sometimes terminate as another entity within C81 C96. Acute exacerbation of, or blastic crisis in, chronic leukaemia should be coded to the chronic form. Example 40: I (a) Acute lymphocytic leukaemia (b) Non Hodgkin's lymphoma Code to non-Hodgkin's lymphoma (C85.9). Example 41: I (a) Acute and chronic lymphocytic leukaemia Code to chronic lymphocytic leukaemia (C91.1). Multiple sites in the same organ system If the sites mentioned are in the same organ system and are contiguous, the .8 subcategories, including those listed in on p. 183 of Volume 1, should be used. This applies when the certificate describes the sites as one site "and" another or if the sites are mentioned on separate lines. Code to the .8 subcategory that embraces both sites. If there is any doubt about the contiguity of the sites mentioned, code to the unspecified site of the organ mentioned. (a) If there is mention of two contiguous subsites in the same site, code to the .8 subcategory of that three character category. Example 42: I (a) Carcinoma of descending colon and sigmoid Code to overlapping malignant neoplasm of colon (C18.8). (b) If the subsites are not contiguous, code to the .9 subcategory of that three character category.

Example 43: I (a) Carcinoma of head of pancreas		
(b) Carcinoma of tail of pancreas		
Code to malignant neoplasm of pancreas, unspecified (C25.9).		
(c) If there is mention of two contiguous sites classified to separate three character		
categories within the same body system, code to the .8 subcategory of that general body		
system (see list in Note 5 in the introduction to Chapter II of Volume 1, p. 183).		
Example 44: I (a) Carcinoma of vagina and cervix		
Code to malignant neoplasm of overlapping sites of female genital organs (C57.8).		
(d) If two sites are mentioned on the certificate and both are in the same organ system		
and have the same morphological type, code to the .9 subcategory of that organ system, as in		
the following list:		
C26.9 Ill defined sites within the digestive system		
C39.9 Ill defined sites within the respiratory system		
C41.9 Bone and articular cartilage, unspecified		
C49.9 Connective and soft tissue, unspecified		
C57.9 Female genital organ, unspecifie		
C63.9 Male genital organ, unspecified		
C68.9 Urinary organ, unspecified		
C72.9 Central nervous system, unspecified		
Example 45: I (a) Pulmonary embolism		
(b) Cancer of stomach		
—(c) Cancer of gallbladder		
Code to ill defined sites within the digestive system (C26.9).		
(e) If there is no available .8 or .9 subcategory, code to malignant neoplasms of		
independent (primary) multiple sites (C97).		
Example 46: I (a) Cardiac arrest		
(b) Carcinoma of prostate and bladder		
Code to malignant neoplasms of independent (primary) multiple sites (C97), since there is		
no available .8 subcategory.		
I. Infectious diseases and malignant neoplasms		
(a) Owing to the effect of chemotherapy on the immune system, some cancer patients		
become prone to infectious diseases and die of them. Therefore, any infectious disease		
classified to A00 B19 or B25-B64 reported as "due to" cancer will be an acceptable		
sequence whether in Part I or II.		
Example 47: I (a) Zoster		
(b) Chronic lymphocytic leukaemia		
Code to chronic lymphocytic leukaemia (C91.1).		
	1	1

(b) Except for human immunodeficiency virus [HIV] disease, no infectious or parasitic disease will be accepted as causing a malignant neoplasm.

Example 48: I (a) Hepatocellular carcinoma

(b) Hepatitis B virus

Code to hepatocellular carcinoma (C22.0).

Example 49: I (a) Burkitt's tumour

(b) Epstein Barr virus

Code to Burkitt's tumour (C83.7).

Example 50: I (a) Cholangiocarcinoma of liver

(b) Clonorchiasis

Code to malignant neoplasm of intrahepatic bile duct (C22.1).

#### J. Malignant neoplasms and circulatory disease

The following acute or fatal circulatory diseases will be accepted in Part I as due to malignant neoplasms:

#### 4.2.7.1 Introduction

Coding malignant neoplasms is no different from coding other conditions. The selection and modification rules should be applied as usual to death certificates mentioning malignant neoplasms, and as in all mortality coding, the coder has to take all information given on the Death Certificate into account when assigning ICD codes.

For neoplasms, it is especially important to consider information on behaviour, morphology and site. When behaviour, morphology and site are well described by the physician, the coder will have no difficulty in finding the correct code for the term in Volume 3. However, the terms stated on the death certificate are not always complete or clear enough. These instructions will help coders to assign codes in such cases. They also show that the same selection and modification rules apply to death certificates mentioning malignant neoplasms as to deaths from other causes.

#### (a) Behaviour, morphology and site

Behaviour, morphology and site must all be considered when coding neoplasms. The behaviour of a neoplasm is the way it acts within the body, i.e., how a tumour is likely to develop. The following ICD grouping refers to behaviour:

C00-C96	Malignant (in	vades surrou	nding tissu	e or dissen	ninates from	its point of origin
and begins to	grow at anothe	r site)	•			•

D00-D09 In situ (malignant but still confined to the tissue in which it originated)

D10-D36 Benign (grows in place without the potential for spread)

D37-D48 Uncertain or unknown behaviour (undetermined whether benign or		
<u>malignant)</u>		
Morphology describes the type and structure of cells or tissues and the behaviour of		
neoplasms. The ICD provides for classification of several major morphological groups		
including the following:		
Carcinomas, including squamous cell carcinoma and adenocarcinoma		
Sarcomas and other soft tissue tumours, including mesotheliomas		
Site-specific types that indicate the site of the primary neoplasm, such as hepatoma (C22.0)		
Lymphomas, including Hodgkin's lymphoma and non-Hodgkin's lymphoma		
Leukaemias Other presified marrhelegical groups such as malignent malename (C42)		
Other specified morphological groups, such as malignant melanoma (C43)		
The ICD categories will give the <i>site</i> of the neoplasm, and also distinguish between the		
different behaviours of the neoplasms. The categories are:		
different behaviours of the neoptasms. The entegories are.		
C00-C75 Malignant neoplasms, stated or presumed to be primary, of specified sites and		
in different types of tissue, except lymphoid, haematopoietic, and related tissue		
C76 Malignant neoplasms of other and ill-defined sites		
C77-C79 Malignant secondary neoplasms, stated or presumed to be spread from		
another site, regardless of morphological type of neoplasm		
Note: these categories (C77-C79) are not to be used for underlying cause of death		
C80 Malignant neoplasm of unspecified site		
C81-C96 Malignant neoplasms, stated or presumed to be primary, of lymphoid,		
haematopoietic, and related tissue		
(b) Using the Alphabetical Index		
The entry "Neoplasm" in the Volume 3 Alphabetical Index gives guidance notes, listing of		
sites, and up to five codes depending on the behaviour of the neoplasm. However, it is		
important to look up the morphological type in the Alphabetical Index before referring to the		
listing under "Neoplasm" for the site. The entry for the morphological type will either state a code to use, or direct you to the correct entry under the main term "Neoplasm".		
code to use, or direct you to the correct entry under the main term (Neopiasm).		
Not all combinations of prefixes in compound morphological terms are indexed. For		
example, the term chondrofibrosarcoma does not appear in the Alphabetical Index, but		
fibrochondrosarcoma does. Since the two terms have the same prefixes, though in a different		
order, code the chondrofibrosarcoma the same as fibrochondrosarcoma.		
order, code the chondrollocollecture the same as notochondrollarollarollar.		
Unless it is specifically indexed, code a morphological term ending in "osis" in the same way		
as the tumour name to which "osis" has been added. For example, code neuroblastomatosis		
· · · · · · · · · · · · · · · · · · ·	 1	

			•		
	in the same way as neuroblastoma. However, do not code hemangiomatosis, which is specifically indexed to a different category, in the same way as hemangioma. Widespread metastasis of a carcinoma is often called carcinomatosis. See Sections 4.2.7.5 and 4.2.7.6 for more detailed coding instructions on metastasizing neoplasms.  If an unqualified nonspecific term such as carcinoma or sarcoma appears with a term describing a more specific histology of the same broad group, code to the site of the more specific morphology, assuming the nonspecific to be metastatic.				
	Note that a malignant neoplasm does not automatically take precedence over other causes of death mentioned on the death certificate. A death should be assigned to a malignant neoplasm only if the selection rules, strictly applied, lead to the selection of the neoplasm as the underlying cause of death.				
	Example 1: I (a) Liver cirrhosis  (b) Viral hepatitis  II Hepatocellular carcinoma				
Revise spelling	Code to viral hepatitis (B19.9). Viral hepatitis is selected by the General Principle. It is not an obvious consequence of hepatocellular carcinoma, which should not be selected as the underlying cause of death.  Example 2: I (a) Renal failure	Germany (URC:1230)	October 2008	Major	January 2010
	(b) Nephropathy (c) Diabetes mellitus (d) Malignant neoplasm of breast  Code to diabetes with renal complications (E14.2). According to the instruction on causes of diabetes in section 4.2.2, malignant neoplasm of breast is rejected as a cause of				
	diabetes. Diabetes is selected as the underlying cause by Rule 1.  4.2.7.2 Implication of malignancy  A mention anywhere on the certificate that a neoplasm has produced secondaries means that				
	the neoplasm must be coded as malignant, even though the neoplasm without mention of metastases would be classified differently.  Example 3: I (a) Brain metastasis				

(b) Lung tumour		
Code to malignant lung cancer (C34.9). The lung tumour is considered malignant since it has		
produced brain metastases. The General Principle applies.		
Example 4: I (a) Metastatic involvement of chest wall  (b) Carcinoma in situ of breast		
Code to malignant carcinoma of breast (C50.9). Since the breast tumour has spread to the chest wall it is no longer <i>in situ</i> , and it is considered malignant. The General Principle		
applies.		
This also applies to other types of growths that are not indexed to Chapter II, for example		
certain polyps. If they are reported as the cause of metastases or secondary tumours, they should be considered malignant and coded as malignant neoplasms.		
Example 5: I (a) Secondary malignant neoplasm of lung		
(b) Polyp of stomach		
Code to primary malignant neoplasm of stomach (C16.9). Since the polyp is reported as the		
cause of secondary spread it is considered malignant. The General Principle applies.		
4.2.7.3 Primary site		
When a malignant neoplasm is considered to be the underlying cause of death, it is most		
important to determine the primary site. When the death certificate is ambiguous as to the primary site, every effort should be made to obtain clarification from the certifier. The		
following instructions in Sections 4.2.7.3 - 4.2.7.9 should be applied only when clarification		
cannot be obtained.		
A. Primary site indicated		
(a) A neoplasm specified as primary		
If one malignant neoplasm is specified as primary, and other neoplasms are mentioned but		
not described as primary, then consider these other neoplasms as secondary. Also consider them as an obvious consequence of the neoplasm specified as primary.		
Example 6: I (a) Transitional cell carcinoma of bladder  II Transitional cell carcinoma, primary in kidney		
11 Transidonal cen caremonia, primary in kidney		

The transitional cell bladder carcinoma on I (a), selected by the General Principle, is not
specified as primary. There is a neoplasm described as primary reported in Part II. Therefore,
Rule 3 applies, and the transitional cell bladder carcinoma on I (a) is considered an obvious
consequence of the primary kidney tumour reported in Part II. Code to malignant neoplasm
of kidney (C64).
This does not apply if the neoplasms have different morphology.
Example 7: I (a) Transitional cell carcinoma of bladder
II Osteosarcoma, primary in knee
The transitional cell bladder carcinoma on I (a) is not specified as primary. Use the General
Principle to select transitional cell carcinoma of bladder as the temporary underlying cause
of death. The malignant neoplasm reported in Part II is of a different morphology. Since a transitional cell carcinoma is not a consequence of an osteosarcoma, Rule 3 does not apply.
Code to malignant neoplasm of bladder (C67.9).
Code to manghant neoprasm of bradder (Co7.9).
For further instructions on certificates with more than one neoplasm specified as primary,
see Section C below.
see section e below.
(b) Other neoplasms specified as secondary
to the tree present as seed and the seed and the seed and the seed as the seed
Secondary malignant neoplasms should be accepted as due to other malignant neoplasms.
Also, malignant neoplasms on the list of common sites of metastases (see Section 4.2.7.5
Table 3), should be accepted as due to other malignant neoplasms.
Example 8: I (a) Secondaries in lung, pleura, brain and liver
(b) Carcinoma of breast
A carcinoma of breast may cause secondaries in pleura, brain, and liver. The General
Principle applies. Select malignant neoplasm of breast (C50.9) as the underlying cause of
death.
A malianant manulanu anasifiad sa sasandama shauld ba sasaidam dan abaisan sasaa
A malignant neoplasm specified as secondary should be considered an obvious consequence of a neoplasm specified as primary.
of a neoptasiii specified as primary.
Example 9: I (a) Secondary carcinoma of lung
II Primary in kidney
First, use the General Principle to select secondary carcinoma of lung as the temporary
underlying cause. However, the secondary neoplasm is an obvious consequence of the

primary kidney tumour. Rule 3 applies, and malignant neoplasm of kidney (C64) is selected as underlying cause of death. Also, if all sites but one are specified as secondary, consider the site not specified as secondary as the primary one. Consequently, Rule 3 applies. Example 10: I (a) Secondaries in lymph nodes, vertebrae and peritoneum Prostate cancer All sites mentioned in Part I are specified as secondary. There is one site reported that is not specified as secondary, namely prostate. First, apply Rule 2 to select the secondary neoplasm in lymph nodes as the temporary underlying cause. Then apply Rule 3, since the secondary spread is an obvious consequence of prostate cancer reported in Part II. Select malignant neoplasm of prostate (C61) as the underlying cause of death. A neoplasm reported as due to a disease that increases the risk of malignancy When a malignant neoplasm is reported as caused by a condition generally considered to increase the risk of a malignancy of that site, code the neoplasm as primary. This applies even if the site is on the list of common sites of metastases (see Table 3 in Section 4.2.7.5). Example 11: I (a) Cancer of liver and lung (b) Chronic hepatitis Code to unspecified malignant neoplasm of liver (C22.9), since chronic hepatitis increases the risk of primary liver cancer. Example 12: I (a) Cancer of lung (b) Cancer of liver (c) Prolonged exposure to vinyl chloride Code to unspecified malignant neoplasm of liver (C22.9), since vinyl chloride increases the risk of primary liver cancer. Using section 4.2.7.5, the cancer of lung is regarded as secondary. Example 13: I (a) Cancer of chest wall Cancer of lung Smoking Code to malignant neoplasm of bronchus or lung, unspecified (C34.9). Tobacco increases

the risk of primary lung cancer. Using section 4.2.7.5, the cancer of chest wall is considered
secondary.
Example 14: I (a) Mesothelioma of pleura and lymph nodes
(b) Prolonged inhalation of asbestos dust
(b) Trolonged initiatation of assessos dust
Code to mesothelioma of pleura (C45.0). Exposure to asbestos increases the risk of pleural
mesothelioma, which is considered primary. The malignant neoplasm of lymph nodes is
considered secondary (see Section 4.2.7.5 D).
Example 15: I (a) Malignant neoplasm of mediastinum and liver
(b) Prolonged inhalation of asbestos dust
Code to malignant neoplasm of mediastinum (C38.3). Exposure to asbestos increases the
risk of cancer in the mediastinum, and the liver neoplasm is considered secondary.
isk of cancer in the mediastinani, and the fiver neoplastic is considered secondary.
For further information on conditions considered to increase the risk of malignancy, please
refer to the WHO website on ICD-10 in classification of mortality.
leter to the who website on ICD-10 in crassification of mortanty.
(d) Site-specific morphology
Note that the Alphabetical Index assigns some morphologies to a specific primary site:
Example 16: I (a) Generalised metastatic spread
(b) Pseudomucinous adenocarcinoma
Select pseudomucinous adenocarcinoma using the General Principle. Code to malignant
neoplasm of ovary (C56), since pseudomucinous adenocarcinoma of unspecified site is
assigned to the ovary in the Alphabetical Index.
usurgined to the overly in the Emphasement meet.
If two or more morphologies are indicated, code according to Section 4.2.7.3 C.
if two of more morphologies are indicated, code according to Section 4.2.7.5 C.
(e) Durations do not indicate primary site
Durations should not be used to establish the primary site, since the same patient could
develop several primary malignant neoplasms. Also, stated duration may refer to the date of
diagnosis rather than the duration of the disease.
Example 17: I (a) Malignant neoplasm of throat 8 months
II Malignant neoplasm of breast 12 years

A condition selected by the General Principle or Rules 1 or 2 should be considered an obvious consequence of a condition reported elsewhere on the certificate only if there is no doubt about the relationship. In this case, the different durations do not necessarily indicate that the malignant neoplasm of throat is a metastatic spread from the breast malignancy, since the patient may have developed two independent primary malignancies. Consequently, Rule 3 does not apply. Code to malignant neoplasm of throat (C14.0) selected by the General Principle.

Example 18: I (a) Malignant neoplasm of kidney (7 months) and of prostate (5 years)

As in Example 15, the different durations do not necessarily indicate that the more recent neoplasm is a metastatic spread from the one with longer duration. Rule 3 does not apply. Both malignant neoplasms are considered primary. Code to malignant neoplasm of kidney (C64), selected by Rule 2.

#### B. Primary site unknown

If the certificate states that the primary site is unknown, code to the category for unspecified site for the morphological type involved. For example, code adenocarcinoma to C80.0, fibrosarcoma to C49.9, and osteosarcoma to C41.9. Disregard any other sites mentioned elsewhere on the certificate.

Example 19:	I (a)	Secondary carcinoma of liver
	(b)	Primary site unknown
	(c)	? stomach ? colon

The certificate states that the primary site is unknown. Disregard stomach and colon mentioned on line I (c), and code to carcinoma without specification of site (C80.0).

Example 20:	I (a)	Generalized metastases
	(b)	Melanoma
	(c)	Primary site unknown

Code to malignant melanoma of unspecified site (C43.9).

If the morphological type is not indicated, code to unspecified malignant neoplasm (C80.9):

Example 21: I (a) Metastases of liver

The certificate does not specify the primary site. If possible, clarification should be sought

from the certifier. If this is not possible, code to malignant neoplasm of unspecified site (C80.9).C. More than one primary neoplasm The presence of more than one primary neoplasm could be indicated in several ways, for example: mention of two or more different anatomical sites two or more distinct morphological types by a mix of a morphological type that implies a specific site, plus another site When a death certificate mentions more than one primary malignant neoplasm, the certifier should be asked to specify one of the malignant neoplasms as the underlying cause of death. If no clarification can be obtained, the selection rules should be applied in the usual way. Two or more different anatomical sites A primary malignant neoplasm of one site should not be accepted as due to a primary neoplasm of another site. Example 22: I (a) Cancer of stomach Cancer of breast Stomach is not on the list of common sites of metastases (see Section 4.2.7.5 Table 3) and both cancer of stomach and cancer of breast are regarded as primary. However, one primary malignant neoplasm is not accepted as due to another. Rule 2 applies, and cancer of stomach (C16.9) is selected as the underlying cause. Example 23: I (a) Cancer of prostate Cancer of stomach II Two different primary neoplasms are mentioned, stomach cancer and cancer of prostate. Use the General Principle to select cancer of prostate (C61), which is mentioned in Part I. Example 24: I (a) Cancer

Acute exacerbation of, or blastic crisis (acute) in, chronic leukaemia is considered an

# П Cancer of prostate Use the General Principle to select unspecified cancer (C80.9) as the temporary underlying cause. Then apply Rule D, Specificity, to select the more specific term "cancer of prostate" (C61), reported in Part II. Two or more different morphologies A malignant neoplasm of a specific morphology should not be accepted as due to a neoplasm of a different morphology. Example 25: I (a) Hypernephroma (b) Oat cell carcinoma Hypernephroma and oat cell carcinoma are different morphologies. Therefore, hypernephroma is not accepted as due to oat cell carcinoma. Use Rule 2 to select hypernephroma (C64) as underlying cause of death. Do not regard the term "cancer" as a specific morphology. It is often used as a synonym of "malignant neoplasm". Example 26: I (a) Liver cancer Malignant melanoma of colon Do not regard "liver cancer" and "malignant melanoma" as different morphologies. Use the General Principle to select malignant melanoma of colon, and code to malignant neoplasm of colon (C18.9). Consider the liver cancer secondary. However, a neoplasm in lymphoid, haematopoietic or related tissue (C81-C96) may develop into another type of neoplasm in lymphoid, haematopoietic or related tissue. Therefore, if the certificate reports a sequence of such neoplasms, the sequence is accepted. Example 27: I (a) Acute lymphocytic leukaemia (b) Non-Hodgkin's lymphoma A non-Hodgkin lymphoma may develop into an acute lymphocytic leukemia. The sequence is accepted, and non-Hodgkin<sup>2</sup>s lymphoma (C85.9) is selected as underlying cause according to the General Principle.

obvious consequence of the chronic form.

# Example 28: I (a) Acute and chronic lymphocytic leukaemia

The acute lymphocytic leukemia, mentioned first on line I (a), is selected as the temporary underlying cause according to Rule 2. However, it is an obvious consequence of the chronic lymphocytic leukaemia. Rule 3 also applies, and chronic lymphocytic leukaemia (C911) is selected as the underlying cause of death.

# (c) Site-specific morphology reported with other sites

Some morphologies are specific for a particular site or type of tissue (see the Alphabetical Index). A malignant neoplasm of a particular site or tissue should not be accepted as due to a neoplasm of another site or type of tissue. Apply the selection rules in the usual way, if a site-specific morphology is reported with a malignant neoplasm of another site.

#### Example 29: I (a) Hodgkin's disease-lymphoma

(b) Carcinoma of bladder

Two different morphological types are mentioned, which indicates the presence of two different primary neoplasms, Hodgkin's disease lymphoma and bladder carcinoma. One primary malignant neoplasm should not be accepted as due to another. Therefore, Rule 2 applies, and Hodgkin's disease lymphoma (C81.9) is selected as the underlying cause.

# Example 30: I (a) Hepatoma

(b) Cancer of breast

The morphology "hepatoma" indicates a primary malignant neoplasm of liver. A primary malignant neoplasm of liver should not be accepted as due to cancer of breast, since both the hepatoma and the breast cancer are considered primary. Code to hepatoma (C22.0), using Rule 2.

# 4.2.7.4 Malignant neoplasms of overlapping sites

The introduction to Chapter II in Volume 1 (Notes, Section 5) describe the contents and the intended use of subcategory .8, malignant neoplasms of overlapping sites. In mortality coding, however, the codes for malignant neoplasms of overlapping sites should be used only if the lesion has been expressly described as overlapping, or if the anatomical term used on the death certificate indicates an overlapping site. Do not use the codes for overlapping lesions if a malignant neoplasm has spread from one part of an organ or organ system to

another part of the same organ or organ system.

Example 31: I (a) Overlapping malignant neoplasm of tongue and floor of mouth

<u>Code to C14.8, overlapping lesion of lip, oral cavity and pharynx. The neoplasm is described as overlapping.</u>

Example 32: I (a) Malignant neoplasm of rectosigmoid colon

Code to C19, malignant neoplasm of rectosigmoid junction. The term "rectosigmoid" indicates an overlapping site.

It is not sufficient that the certificate enumerates contiguous sites. In that case, select the underlying cause by applying the selection and modification rules in the normal way.

Example 33: I (a) Malignant neoplasm of colon and gallbladder

There is no statement that the "colon and gallbladder" refers to an overlapping neoplasm. Therefore, they are considered as two independent primary sites. Malignant neoplasm of colon (C18.9) is selected as underlying cause of death according to Rule 2, since it is mentioned first on the certificate.

#### 4.2.7.5. Common sites of metastases

#### A. List of common sites of metastases

Although malignant cells can metastasize anywhere in the body, certain sites are more common than others and must be treated differently. These sites are listed in Table 3 below.

# **Table 3. Common sites of metastases**

BoneMediastinumBrainMeningesDiaphragmPeritoneumIll-defined sites (sites classifiable to C76)Pleura

<u>Liver</u> Lung (see special instruction) Retroperitoneum Spinal cord

Lymph nodes (see special instruction)

#### B. Common sites of metastases: how to use the list

	(a) A common site of metastases reported with other sites  If several sites are reported on the death certificate and the primary site is not indicated, consider neoplasms of sites in Table 3 as secondary, and those not in Table 3 as primary. Then select the underlying cause by applying the selection rules in the usual way.				
	Example 34: I (a) Brain cancer (b) Cancer of breast				
	Breast is not in Table 3 and is, therefore, considered primary. Brain is in Table 3 and is considered secondary. A secondary malignancy could, of course, be due to a primary one. Breast cancer (C50.9) is selected as the underlying cause according to the General Principle.	Germany 1230	October 2008	Major	January 2010
	Example 35: I (a) Peritoneal cancer II Cancer of breast	Germany 1230	October 2008	Major	January 2010
	Peritoneum is in Table 3 and is considered secondary. Breast is not in Table 3 and is considered primary. First, apply the General Principle to select peritoneal cancer as the temporary underlying cause. However, the (secondary) peritoneal cancer is an obvious consequence of the (primary) cancer of breast, see Section 4.2.7.3 A (b). Therefore, apply Rule 3 and select cancer of breast (C50.9) as the underlying cause of death.				
Revise spelling	Example 36: I (a) Cancer of liver  (b) Cancer of colon  (c) Cancer of bladder				
	Liver is in Table 3 and is considered secondary. Colon and bladder are not in Table 3 and are both assumed to be primary. However, a primary cancer of colon should not be accepted as due to a primary cancer of bladder. There is still an acceptable sequence on the certificate, namely (secondary) liver cancer due to (primary) cancer of colon. Use Rule 1 to select malignant neoplasm of colon (C18.9) as underlying cause of death.				
	Note:				
	1) A neoplasm of a site listed in Table 3 is considered primary when it is reported as due to a condition that increases the risk of a malignancy of that site or tissue, see Section 4.2.7.3 A (c).				
	2) When a malignant neoplasm of one of the sites listed in Table 3 is the only malignant neoplasm mentioned on a death certificate, and it is not qualified as "metastatic", it is also				

	considered primary.		
	(b) A common site of metastases reported with other morphological types  If a neoplasm of a site in Table 3 is reported together with a neoplasm of a different morphology, consider the neoplasm in Table 3 as secondary, and those of a different morphology as primary. Then select the underlying cause by applying the selection rules in		
	the usual way.		
	Example 37: I (a) Liver cancer  (b) Adenocarcinoma of colon  (c) Malignant melanoma of skin of thigh		
Revise text	Liver is in Table 3 and is considered secondary. Colon and skin are not in Table 3 and are both assumed to be primary. However, the colon and skin malignancies are of different morphology. Consequently, adenocarcinoma of colon is not accepted as due to malignant melanoma of intestine. A (secondary) liver cancer, however, can be due to adenocarcinoma of colon, so there is a sequence ending with the liver cancer reported on line I (a). Malignant neoplasm of colon is selected as underlying cause according to Rule 1.		
	Do not regard "liver cancer" as a separate morphology, see Section 4.2.7.3 C (b).		
	(c) All reported sites are on the list of common sites of metastases  If all reported sites are in Table 3, they should all be considered secondary. This means that no primary tumour is reported, and the case should be coded to malignant neoplasm of		
	unspecified site (C80.9).		
	Example 38: I (a) Cancer of brain, ribs, pleura, and peritoneum		
	The sites mentioned are all in Table 3 and are all considered secondary. Code the case to malignant neoplasm of unspecified site (C80.9).		
	Note that special instructions apply to cases where lung is reported with other sites listed in Table 3. See Section 4.2.7.5 C.		
	C. Special instruction: lung		
	The lung poses special problems in that it is a common site for both metastases and primary		

malignant neoplasms. It is considered primary or secondary, depending on other neoplasms reported on the certificate, if any.		
(a) Lung considered a primary neoplasm		
If lung is the only site mentioned on the certificate, it is considered primary.		
Example 39: I (a) Lung cancer		
Lung is the only site mentioned, and therefore lung is considered primary. The General Principle applies and carcinoma of lung (C34.9) is selected as the underlying cause of death.		
Also, if all other sites are in Table 3, lung is considered primary.		
Example 40: I (a) Cancer of liver (b) Carcinoma of lung		
Liver is in Table 3, and therefore lung is considered primary. The General Principle applies and carcinoma of lung (C34.9) is selected as the underlying cause of death.		
When a malignant neoplasm of bronchus or bronchogenic cancer is mentioned, this neoplasm should also be considered primary.		
Example 41: I (a) Carcinoma of bronchus  (b) Carcinoma of breast		
Neither bronchus nor breast are in Table 3, and therefore both are considered primary. One primary neoplasm is not accepted as due to another, and therefore Rule 2 applies. Select malignant neoplasm of bronchus (C34.9) as underlying cause of death.		
Note: A neoplasm of lung is considered primary when it is reported as due to a condition that increases the risk of lung cancer, see Section 4.2.7.3 A (c).		
(b) Lung considered a secondary neoplasm		
If an unspecified malignant neoplasm of lung is reported as due to another malignant neoplasm, the lung neoplasm is considered secondary and the sequence accepted.		
Example 42: I (a) Lung cancer		

Stomach cancer is selected by the General Principle, since (secondary) lung cancer is accepted as due to the stomach cancer.

<u>Lung should also be considered secondary whenever it appears in Part I with sites that are not mentioned in Table 3.</u>

# Example 43: I (a) Carcinoma of lung and breast

<u>Lung carcinoma is considered secondary since it is reported with breast, which is not in Table 3.</u> Rule 3 applies, and the secondary lung carcinoma is considered an obvious consequence of the carcinoma of breast. Code to malignant neoplasm of breast (C50.9).

Note: A neoplasm of lung is considered primary when it is reported as due to a condition that increases the risk of lung cancer, see Section 4.2.7.3 A (c).

An unspecified malignant neoplasm of lung should not be considered an obvious consequence of a malignant neoplasm reported elsewhere on the death certificate.

# Example 44: I (a) Lung cancer II Stomach cancer

The lung cancer is not specified as either secondary or metastatic. Therefore, it is not considered an obvious consequence of stomach cancer reported in Part II, and Rule 3 does not apply. Select lung cancer (C34.9) as underlying cause of death, according to the General Principle.

# D. Special instruction: lymph node

Malignant neoplasm of lymph nodes not specified as primary should be assumed to be secondary.

# Example 45: I (a) Cancer of cervical lymph nodes

Code to malignant neoplasm of unspecified site, (C80.9). The cancer of cervical lymph nodes is considered secondary to an unspecified primary malignant neoplasm.

# 4.2.7.6 Metastatic cancer

Note: The expression "metastatic" is a problem mainly in the English language. Other

<u>countries should translate only as much as needed of Section 4.2.7.6.</u>

Neoplasms qualified as metastatic are **always** malignant, either primary or secondary. However, the adjective "metastatic" is used in two ways, sometimes meaning a secondary from a primary elsewhere and sometimes denoting a primary that has given rise to metastases.

(a) Malignant neoplasm "metastatic from"

<u>If a malignant neoplasm is described as "metastatic from" a specified site, that site should be</u> considered primary.

Example 46: I (a) Metastatic teratoma from ovary

The expression "metastaticteratoma from ovary" implies that the neoplasm originated in the ovary. Code to malignant neoplasm of ovary (C56).

This also applies to sites on the list of common sites of metastases.

Example 47: I (a) Metastatic mesothelioma from peritoneum

A "metastatic mesothelioma from peritoneum" is primary in the peritoneum, although peritoneum is one of the sites listed in Table 3. Code to malignant mesothelioma of peritoneum (C45.1).

(b) Malignant neoplasm "metastatic to"

A malignant neoplasm described as "metastatic to" a specified site should be interpreted as a secondary neoplasm of the specified site, whether the site is on the list of common sites of metastases or not. Code to malignant neoplasm of unknown primary site (C80.9) if no primary site is indicated.

Example 48: I (a) Metastatic carcinoma to the rectum

The expression "metastatic to" indicates that rectum is a secondary site. Code malignant neoplasm of unknown primary site (C80.9) as underlying cause of death, since no primary site is indicated

<u>If a morphology classifiable to C40-C47, C49, or C70-C72 is reported, code to the "unspecified site" subcategory of that morphological type.</u>

1	Example 49: I (a) Metastatic osteosarcoma to brain		
<u> </u>	The expression "metastatic to brain" indicates that brain is a secondary site. However, the osteosarcoma is indexed to malignant neoplasm of bone in the Alphabetical Index. Code unspecified malignant neoplasm of bone ( <b>C41.9</b> ) as underlying cause of death.		
1	(c) Malignant neoplasm metastatic of site A to site B		
	A malignant neoplasm described as metastatic of site A to site B should be interpreted as primary of site A and secondary of site B.		
<u>l</u>	Example 50: I (a) Metastatic cancer of liver to brain  II Oesophageal cancer		
<u>1</u>	The expression "metastatic of liver to brain" indicates that the malignancy originated in the liver and spread to the brain. When selecting the underlying cause of death, code to primary cancer of liver (C22.9).		
<u>(</u>	Since there is an indication that liver is the primary site, the instructions in Section 4.2.7.5 B  (a) on sites in Table 3 reported with other sites do not apply. Liver is still considered the primary site, even though oesophageal cancer is also mentioned.		
<u>(</u>	(d) "Metastatic" malignant neoplasm on the list of common sites of metastases		
_	A "metastatic" neoplasm is considered secondary if the site is on the list of common sites of metastases.		
<u>!</u> - -	Example 51: I (a) Bowel obstruction  (b) Metastatic cancer of peritoneum  (c) Sarcoma of uterus		
	Metastatic cancer of peritoneum is considered secondary, since peritoneum is in Table 3.  Sarcoma of uterus (C55) is selected as underlying cause by the General Principle.		
<u> </u>	Use Rule 3 if applicable.		
<u>1</u>	Example 52: I (a) Metastatic cancer of pleura II Cancer of stomach		

The pleura cancer is described as metastatic and is considered secondary. Stomach cancer is also reported and is considered primary (see Section 4.2.7.3 A (b)). First, apply the General Principle to select the pleural cancer as the temporary underlying cause. However, (secondary) pleura cancer is considered an obvious consequence of (primary) stomach cancer, according to Rule 3. Stomach cancer (C16.9) is selected as underlying cause of death. A neoplasm of a site in Table 3 is considered secondary, even if no other neoplasm is mentioned on the certificate. Note that a secondary malignant neoplasm should not be selected as the underlying cause of death. If no primary tumour is reported, code the case to malignant neoplasm of unspecified site (C80.9). Example 53: I (a) Metastatic brain cancer Brain is one of the sites in Table 3, and the "metastatic" brain cancer is considered secondary. There is no primary neoplasm reported. Therefore, code to malignant neoplasm of unknown primary site (C80.9). Note: A neoplasm of a site listed in Table 3 is considered primary when it is reported as due to a condition that increases the risk of a malignancy of that site or tissue, see Section 4.2.7.3 A (c). "Metastatic" malignant neoplasm not on the list of common sites of metastases If a site that is not on the list of common sites of metastases is qualified as "metastatic" or "metastatic of", consider it primary and code to malignant primary of that particular site. Example 54: I (a) Cervix cancer, metastatic Cervix is not in Table 3, and the "metastatic" cervix cancer is therefore considered primary. Code to malignant neoplasm of cervix (C53.9). Apply the selection rules in the usual way. Example 55: I (a) Metastatic adenocarcinoma of prostate (b) Metastatic adenocarcinoma of colon Prostate and colon are not in Table 3, and both neoplasms are considered primary. One primary neoplasm is not accepted as due to another. Rule 2 applies, and malignant neoplasm of prostate (C61) is selected as underlying cause.

(f) "Metastatic" cancer of lung		
If the only malignancy mentioned is "metastatic" neoplasm of lung, code to primary malignant neoplasm of lung.		
Example 56: I (a) Metastatic carcinoma of lung		
Code to primary malignant neoplasm of lung (C34.9) since no other site is mentioned.		
Also consider a "metastatic" neoplasm of lung primary, if all other neoplasm sites reported on the death certificate are on the list of common sites of metastases.		
Example 57: I (a) Metastatic cancer of lung II Cancer of pleura, liver and brain		
"Metastatic cancer of lung" is considered primary, since pleura, liver, and brain are all in Table 3. Select malignant neoplasm of lung (C34.9) as underlying cause of death.		
If another malignancy is mentioned that is not on the list of common sites of metastases, consider lung secondary.		
Example 58: I (a) Metastatic cancer of lung II Stomach cancer		
Since stomach cancer is also mentioned, "metastatic cancer of lung" is considered secondary. First use the General Principle to select the (secondary) lung cancer as the temporary underlying cause. Then apply Rule 3, and consider (secondary) cancer of lung an obvious consequence of the stomach cancer mentioned in Part II. Select stomach cancer (C16.9) as the underlying cause of death.		
Note: A neoplasm of lung is considered primary when it is reported as due to a condition that increases the risk of lung cancer, see Section 4.2.7.3 A (c).		
(g) "Metastatic" neoplasm of a specific morphology		
If the morphological type is classifiable to C40-C47, C49, or C70-C72 and the site reported on the certificate indicates the same type of tissue, code to the appropriate subcategory for the morphological type.		
Frample 50: I(a) Matastatic astacsarcoma of famur		

Code to malignant neoplasm of long bones of lower limb (C40.2).

If the morphological type is classifiable to C40-C47, C49, or C70-C72 and the site reported on the certificate indicates a different type of tissue, code to the unspecified site for the morphological type.

Example 60: I (a) Metastatic rhabdomyosarcoma

(b) of hilar lymph nodes

Code to unspecified site for rhabdomyosarcoma (C49.9).

### 4.2.7.7 Sites with prefixes or imprecise definitions

Neoplasms of sites prefixed by "peri," "para," "pre," "supra," "infra," etc. or described as in the "area" or "region" of a site, unless these terms are specifically indexed, should be coded as follows:

For malignant neoplasms classifiable to one of the categories

- C40, C41 (bone and articular cartilage),
- C43 (malignant melanoma of skin),
- C44 (other malignant neoplasms of skin),
- C45 (mesothelioma),
- C46 (Kaposi's sarcoma)
- C47 (peripheral nerves and autonomic nervous system),
- C49 (connective and soft tissue),
- C70 (meninges),
- C71 (brain),
- <u>- C72 (other parts of central nervous system),</u> code to the appropriate subdivision of that category

Example 61: I (a) Fibrosarcoma in the region of the pancreas

Code to malignant neoplasm of connective and soft tissue of abdomen (C49.4).

Example 62: I (a) Peridiaphragmatic angiomyosarcoma

Code to malignant neoplasm of connective and soft tissue of thorax (C49.3).

For other morphological types code to the appropriate subdivision of C76 (other and ill-defined sites).

Example 63: I (a) Carcinoma in the lung area Code to malignant neoplasm of other and ill-defined sites within the thorax. (C76.1) Example 64: I (a) Paravertrebral carcinoma Code to malignant neoplasm of other ill-defined sites (C76.7). Example 65: I (a) Malignant neoplasm, infradiaphragmal Code to malignant neoplasm of abdomen (C76.2). 4.2.7.8 Malignant neoplasms of unspecified site with other reported conditions When the site of a primary malignant neoplasm is not specified, no assumption of the site should be made from the location of other reported conditions such as perforation, obstruction, or haemorrhage. These conditions may arise in sites unrelated to the neoplasm, e.g. intestinal obstruction may be caused by the spread of an ovarian malignancy. Example 66: I (a) Obstruction of intestine Carcinoma Code to malignant neoplasm without specification of site (C80.9). Example 67: I (a) Respiratory insufficiency (b) Obstruction of trachea Malignancy Code to malignant neoplasm without specification of site (C80.9). 4.2.7.9 Infectious diseases and malignant neoplasms Infections due to malignant neoplasm Owing to the effect of chemotherapy on the immune system, some cancer patients become prone to infectious diseases and die of them. Therefore, any infectious disease classified to A00-B19 or B25-B64 reported as "due to" cancer will be an acceptable sequence. Example 68: I (a) Zoster Chronic lymphocytic leukaemia

<u>Chronic lymphocytic leukaemia could cause a zoster infection. The sequence is accepted, and chronic lymphocytic leukaemia (C91.1) is selected as the underlying cause of death.</u>

#### (b) Malignant neoplasm due to infections

There is evidence for strong aetiological links between some infections and particular cancers, e.g., human papilloma virus and cervical cancer, or chronic hepatitis C viral infection and liver cancer. However, reporting of such risk factors on death certificates is incomplete. For purposes of vital statistics and public health it is regarded as important to be able to count all the deaths due to particular cancers, whatever their causal factors. Therefore, except for human immunodeficiency virus [HIV] disease, no infectious or parasitic disease should be accepted as causing a malignant neoplasm.

# Example 69: I (a) Hepatocellular carcinoma

(b) Hepatitis B virus

Hepatitis B increases the risk of liver cancer. However, it is considered more important to register the number of liver cancer deaths, and the sequence is not accepted. Use Rule 2 to select hepatocellular carcinoma (C22.0) as underlying cause of death.

# Example 70: I (a) Kaposi's sarcoma

(b) HIV

HIV is accepted as causing malignant neoplasms. First, use the General Principle to select HIV as the temporary underlying cause. Then use Rule C (Linkage) to code HIV disease resulting in Kaposi's sarcoma (B21.0) as underlying cause of death.

# 4.2.7.10 Malignant neoplasms and circulatory disease

The following acute or fatal circulatory diseases will be accepted as due to malignant neoplasms, if certified in a "due to" sequence in Part I:

121-122	Acute myocardial infarction
I24	Other acute ischaemic heart diseases

I26.- Pulmonary embolism
I30.- Acute pericarditis

I33.- Acute and subacute endocarditis

I40.- Acute myocarditis

I44.- Atrioventricular and left bundle-branch block

I45.- Other conduction disorders

	I46 Cardiac arrest	T				
	<ul><li>I47 Paroxysmal tachycardia</li><li>I48 Atrial fibrillation and flutter</li></ul>					
	I49 Other cardiac arrhythmias					
	I50 Heart failure					
	I51.8 Other ill-defined heart disease					
	I60-I69 Cerebrovascular diseases, exc	ept 167.0-167.5, 167.9, 169				
	The following circulatory diseases will not be accep	ted as due to malignant neoplasms:				
		ic heart disease when reported as due to endocrine				
	neoplasms, renal neoplasms and carcinoid tumours)					
	I20 Angina pectoris					
	I25 Chronic ischaemic heart disea	se				
	I70 Atherosclerosis					
Page 88	4.2.7.3 Primary site		MRG	October 2010	Minor	January 2012
Section 4.2.7	•••		1717			Corrections to
	C. More than one primary neoplasm					URC #1230
	(c) Site-specific morphology reported with other	rsites				
	Example 29: I (a) Hodgkin lymphoma					
	(b) Carcinoma of bladder					
	Two different morphological types are mentioned, w	which indicates the presence of two				
	different primary neoplasms, Hodgkin lymphoma ar					
Revise Text	malignant neoplasm should not be accepted as due to					
	Hodgkin lymphoma, <u>unspecified</u> (C81.9) is selected	as the underlying cause.				
			MRG	October 2011	Major	January 2013
	4.2.7.9 Infectious diseases and malignant neoplasm	es .	1770	October 2011	iviajui	January 2015
	(a) Infections due to malignant neoplasm					
	Owing to the effect of chemotherapy on the immune					
	prone to infectious diseases and die of them. Therefore					
Revise text	classified aside from those listed in A00 B19 or B25	B64 section 4.2.2 A.(a) reported as				
	"due to" cancer will be an acceptable sequence.					
Insert a new	4.2.8 Involvement of multiple types of substance in	ise_	MRG	October 2006	Major	January 2010
section	If a condition classifiable to F10-F19 or F55 is select		1023		,	_
	other conditions also classified to F10-F19 or F55 ar					
L						

	proceed as follows:		
	i) If one condition is specified as the cause of death, code to that condition.		
	ii) When no single condition is specified as the main cause of death, clarification should		
	be sought from the certifier.		
	iii) When no such clarification can be obtained, select the underlying cause in the following		
	order of priority:		
Renumber	1) Mental and behavioural disorders due to use of opioids (F11)		
remaining	2) Mental and behavioural disorders due to use of cocaine (F14)		
sections.	3) Mental and behavioural disorders due to use of other stimulants, including caffeine (F15)		
	4) Mental and behavioural disorders due to use of synthetic narcotics, in F19		
	5) Abuse of antidepressants and non-opioid analgesics, in F55		
add note	6) Mental and behavioural disorders due to use of cannabinoids (F12), Mental and		
	behavioural disorders due to use of sedatives and hypnotics (F13), Mental and behavioural		
	disorders due to use of hallucinogens (F16), Mental and behavioural disorders due to use of		
modify text	tobacco (F17), Mental and behavioural disorders due to use of volatile solvents (F18),		
mounty text	Mental and behavioural disorders due to use of substances other than synthetic narcotics		
	classified to F19, Abuse of non-dependence-producing substances other than antidepressants		
	and non-opioid analgesics classified to F55.		
	7) Mental and behavioural disorders due to use of alcohol (F10)		
	If the death certificate reports more than one mental and behavioural disorder in the same		
	priority group, code to first mentioned.		
	4.2.9 Rheumatic fever with heart involvement		
	Time American With neutrin with neutrin with neutrin in the neutri		
	4.2.1112 Poisoning by drugs, medicaments and biological substances		
	When combinations of medicinal agents classified differently are involved, proceed as		
	follows:		
	A) Selection of the underlying cause of death		
	i) If one component of the combination is specified as the cause of death, code to that		
	component.		
	Ex.: I(a) Poisoning by amphetamine		
	II Toxic levels of heroin and flunitrazepam		
	Code to accidental poisoning by amphetamine (X41). By placing amphetamine poisoning		
	alone in Part I and reporting the other substances as contributing causes of death in Part II,		
	the certifier has identified amphetamine as the most important substance in bringing about		
	the death.		
	Ex.: I(a) Poisoning by alcohol		
	II Toxic levels of heroin and flunitrazepam		
	Code to accidental poisoning by alcohol (X45). By placing alcohol poisoning alone in Part I		
	and reporting the other substances as contributing causes of death in Part II, the certifier has		
	identified alcohol as the most important substance in bringing about the death.		
	Ex.: I(a) Poisoning by heroin		
	II Toxic levels of alcohol and flunitrazepam		

Code to accidental poisoning by heroin (X42). By placing heroin poisoning alone in Part I and reporting the other substances as contributing causes of death, the certifier has identified heroin as the most important substance in bringing about the death.

- ii) When no component is specified as the main cause of death, clarification should be sought from the certifier.
- iii) When no such clarification can be obtained, code combinations of alcohol with a drug to the drug. For other multi-drug deaths, code to the appropriate category for "Other".
- iv) When F10-F19 is reported on the same record with a poisoning, proceed as follows:
- <u>F10-F19 Mental and behavioural disorders due to psychoactive substance use</u> *with mention of:*

X40-X49 Accidental poisoning by and exposure to noxious substances, code X40-X49

X60-X69 Intentional self-poisoning by and exposure to noxious substances, code X60-X69

X85-X90 Assault by noxious substances, code X85-X90

Y10-Y19 Poisoning by and exposure to drugs, chemicals and noxious substances, code Y10-Y19

Fourth character .0 (Acute intoxication), code **X40-X49**, **X60-X69**, **X85-X90** or **Y10-Y19** Refer to section 4.1.11 when multiple conditions classified to F10-F19 are reported on the same record.

B) Identifying the most dangerous drug

To provide useful statistics on multiple drug deaths, it is of utmost importance that the most dangerous drug is identifiable in addition to the underlying cause (see also *Nature of injury*, pp 86-87). When selecting the code for the most dangerous drug, apply the following instructions.

If one component of the combination is specified as the cause of death, code to that component. If no single component is indicated as the cause of death, code combinations of alcohol with a drug to the drug. When the classification provides a specific category for a combination of drugs, e.g. mixed antiepileptics (T42.5), code to that category. If no appropriate combination category is available, select the main injury code in the following order of priority:

1. Opioids (T40.0-T40.2)

Combinations including opioids classifiable to more than one fourth-character subcategory in T40.0-T40.2: Code to T40.2

- 2. Cocaine (T40.5)
- 3. Psychostimulants with abuse potential (T43.6)

Includes: Amphetamine and derivates

4. Synthetic narcotics and other and unspecified narcotics (T40.3-T40.4, T40.6)

Combinations including synthetic narcotics classifiable to more than one fourth-character subcategory in T40.3-T40.4: Code to T40.4

Combinations including synthetic narcotics classifiable to more than one fourth-character subcategory in T40.3-T40.4 with other and unspecified narcotics classifiable to T40.6: Code to T40.6

5. Antidepressants (T43.0-T43.2)

	Combinations including antidepressants classifiable to more than one fourth-character subcategory in T43.0-T43.2: Code to T43.2  6. Non-opioid analgesics (T39)  Combinations including non-opioid analgesics classifiable to more than one fourth-character subcategory in T39.0-T39.4: Code to T39.8  7. Drugs and substances not listed above  If the death certificate reports more than one such drug, code to the first mentioned.  If there is more than one drug in the same priority group, code to the first mentioned.				
Page 86  Add text	4.2.9 Congenital malformations, deformations and chromosomal abnormalities If the interval between onseton the medical certificate.  On neonatal or infant death certificates, where lung or pulmonary hypoplasia is given with any mention of immaturity, prematurity, short gestation or low birth weight, code to pulmonary immaturity (P28.0) and not to Q33.6.	MRG 0118	October 2002	Major	January 2006
Page 87 Change existing text as indicated Add text	4.2.11 Poisoning by drugs, medicaments and biological substances  When combinations of medicinal agents classified differently are involved, proceed as follows: if one component of the combination is specified as the cause of death, code to that component; if no component is specified as the cause of death, code to the category provided for the combination, e.g. mixed anticleptics (T42.5). Otherwise, if the components are classified to the same three character category, code to the appropriate subcategory for "Other"; if not, code to T50.9.  A) Selection of the underlying cause of death  i) If one component of the combination is specified as the cause of death, code to that component.  Ex.: I(a) Poisoning by amphetamine  II Toxic levels of heroin and flunitrazepam  Code to accidental poisoning by amphetamine (X41). By placing amphetamine poisoning alone in Part I and reporting the other substances as contributing causes of death in Part II, the certifier has identified amphetamine as the most important substance in bringing about the death.	MRG 0193	October 2003	Major	January 2006
	Ex.: I(a) Poisoning by alcohol  II Toxic levels of heroin and flunitrazepam  Code to accidental poisoning by alcohol (X45). By placing alcohol				

poisoning alone in Part I and reporting the other substances as contributing causes of death in Part II, the certifier has identified alcohol as the most important substance in bringing about the death.

#### Ex.: I(a) Poisoning by heroin

II Toxic levels of alcohol and flunitrazepam

Code to accidental poisoning by heroin (X42). By placing heroin

poisoning along in Port Land reporting the other substances as contribut

poisoning alone in Part I and reporting the other substances as contributing causes of death, the certifier has identified heroin as the most important substance in bringing about the death.

- ii) When no component is specified as the main cause of death, clarification should be sought from the certifier.
- iii) When no such clarification can be obtained, code combinations of alcohol with a drug to the drug. For other multi-drug deaths, code to the appropriate category for "Other".

#### B) Identifying the most dangerous drug

To provide useful statistics on multiple drug deaths, it is of utmost importance that the most dangerous drug is identifiable in addition to the underlying cause (see also *Nature of injury*, pp 86-87). When selecting the code for the most dangerous drug, apply the following instructions.

If one component of the combination is specified as the cause of death, code to that component. If no single component is indicated as the cause of death, code combinations of alcohol with a drug to the drug. When the classification provides a specific category for a combination of drugs, e.g. mixed antiepileptics (T42.5), code to that category. If no appropriate combination category is available, select the main injury code in the following order of priority:

#### 1. Opioids (T40.0-T40.2)

Combinations including opioids classifiable to more than one fourthcharacter subcategory in T40.0-T40.2: Code to T40.2

- 2. Cocaine (T40.5)
- 3. Psychostimulants with abuse potential (T43.6)

Includes: Amphetamine and derivates

4. Synthetic narcotics and other and unspecified narcotics (T40.3-T40.4, T40.6)

Combinations including synthetic narcotics classifiable to more than one fourth-character subcategory in T40.3-T40.4: Code to T40.4

Combinations including synthetic narcotics classifiable to more than one

	fourth-character subcategory in T40.3-T40.4 with other and unspecified narcotics classifiable to T40.6: Code to T40.6  5. Antidepressants (T43.0-T43.2)  Combinations including antidepressants classifiable to more than one fourth-character subcategory in T43.0-T43.2: Code to T43.2  6. Non-opioid analgesics (T39)  Combinations including non-opioid analgesics classifiable to more than one fourth-character subcategory in T39.0-T39.4: Code to T39.8  7. Drugs and substances not listed above  If the death certificate reports more than one such drug, code to the first mentioned.				
Page 104	<ul> <li>4.2.12 Poisoning by drugs, medicaments and biological substances</li> <li>When combinations of medicinal agents classified differently are involved, proceed as follows:</li> <li>A) Selection of the underlying cause of death</li> </ul>	MRG 1473	October 2010	Minor	January 2012
Add text	i) If one component of the combination is specified as the eause of death most important substance in bringing about the death, code to that component.  Example x: I(a) Accidental heroin overdose II Diazepam and amitriptyline present  Code to accidental poisoning by heroin (X42). By placing heroin overdose alone in Part I and reporting the other substances as contributing causes of death in Part II, the certifier has identified heroin as the most important substance in bringing about the death.  Example 5: I(a) Poisoning by amphetamine II Toxic levels of heroin and flunitrazepam  Code to accidental poisoning by amphetamine (X41). By placing amphetamine poisoning alone in Part I and reporting the other substances as contributing causes of death in Part II, the certifier has identified amphetamine as the most important substance in bringing about the death.  Example 6: I(a) Poisoning by alcohol II Toxic levels of heroin and flunitrazepam				

Code to accidental poisoning by alcohol (X45). By placing alcohol poisoning alone in Part I and reporting the other substances as contributing causes of death in Part II, the certifier has identified alcohol as the most important substance in bringing about the death.

Example 7: I(a) Poisoning by heroin

II Toxic levels of alcohol and flunitrazepam

Code to accidental poisoning by heroin (X42). By placing heroin poisoning alone in Part I and reporting the other substances as contributing causes of death, the certifier has identified heroin as the most important substance in bringing about the death.

ii) When no component is specified as the main cause of death most important substance in bringing about the death, clarification should be sought from the certifier.

Add text

iii) When no such clarification can be obtained, code combinations of alcohol with a drug to the drug. For other multi-drug deaths, code to the appropriate category for "Other".

Example x: I(a) Accidental overdose of heroin and amphetamine

Code to accidental poisoning by and exposure to other and unspecified drugs, medicaments and biological substances (X44). Neither of the drugs reported in Part I is identified as the most important substance in bringing about the death and there is no specific code category for the combination of these substances.

. . .

B) Identifying the most dangerous drug for main nature of injury coding

To provide useful statistics on multiple drug deaths, it is of utmost importance that the <u>nature of injury code for the</u> most dangerous drug is identified in addition to the underlying cause code (see also Nature of injury, pp 86-87). When selecting the <u>main nature of injury code</u> for the most dangerous drug, apply the following instructions.

If one component of the combination is specified as the cause of death, code the main nature of injury to that component. If no single component is indicated as the cause of death, code combinations of alcohol with a drug to the drug. When the classification provides a specific category for a combination of drugs, e.g. mixed antiepileptics (T42.5), code to that category. If no appropriate combination category is available, select the main nature of injury code in the following order of priority:

1. Opioids (T40.0-T40.2)

Combinations including opioids classifiable to more than one fourth-character subcategory

in	T40.0-T40.2: Code to T40.2				
	Cocaine (T40.5)				
3.	Psychostimulants with abuse potential (T43.6)				
In	cludes: Amphetamine and derivatives				
4.	Synthetic narcotics and other and unspecified narcotics (T40.3-T40.4, T40.6)				
	ombinations including synthetic narcotics classifiable to more than one fourth-character				
	abcategory in T40.3-T40.4: Code to T40.4				
	ombinations including synthetic narcotics classifiable to more than one fourth-character				
	abcategory in T40.3-T40.4 with other and unspecified narcotics classifiable to T40.6: Code				
	T40.6				
	Antidepressants (T43.0-T43.2)				
	ombinations including antidepressants classifiable to more than one fourth-character				
	abcategory in T43.0-T43.2: Code to T43.2				
	Non-opioid analgesics (T39)				
	ombinations including non-opioid analgesics classifiable to more than one fourth-character				
	ibcategory in T39.0-T39.4: Code to T39.8				
	Drugs and substances not listed above				
	the death certificate reports more than one such drug, code to the first mentioned.				
Ex	xample x: I(a) Heroin, cocaine, diazepam and amitriptyline overdose				
	<u></u>				
Uı	inderlying cause of death: Code to accidental poisoning by and exposure to other and				
	aspecified drugs, medicaments and biological substances (X44). None of the drugs				
	ported in Part I are identified as the most important substance in bringing about the death				
	nd there is no specific code category for the combination of these substances.				
M	<i>lain nature of injury:</i> Code to poisoning by heroin (T40.1). On the priority list above,				
	eroin is in group 1, cocaine (T40.5) is in group 2, diazepam (T42.4) is in group 7 and				
	mitriptyline (T43.0) is in group 5.				
<u></u>					
Ex	xample x: I(a) Accidental poisoning by alcohol, heroin and diazepam				
Ui	inderlying cause of death: Code to accidental poisoning by and exposure to other and				
	aspecified drugs, medicaments and biological substances (X44). Poisoning by				
	ombinations of alcohol and drug(s) are coded to the drug(s) (see instruction 4.2.11, A.				
	i). Neither of the drugs reported in Part I is identified as the most important substance in				
	ringing about the death and there is no specific code category for the combination of these				
su	<u>ibstances</u>				
<u>M</u>	<i>Tain nature of injury:</i> Code to poisoning by heroin (T40.1 On the priority list above, heroin				
<u>(T</u>	[40.1] is in priority group 1 and diazepam (T42.4) is in group 7.				
Please note 4.2	2.11 Nature of injury	MRG	October 2011	Major	January 2013

that rules were re-numbered previously	When death is caused by an injury or poisoning classified to Chapter XIX (S00-T98), code the external cause of the injury or poisoning (Chapter XX, V01-Y89) as underlying cause of death.	1219		
	In addition to the underlying cause from Chapter XX (V01-Y89), code also a main injury (S00-T98). If more than one injury is reported on the death certificate, apply the following instructions:			
	a) When the injuries reported include superficial and trivial injury (as listed in Appendix 7.1 List of conditions unlikely to cause death), whether in Part I or Part II, select the main injury as if the superficial or trivial injury had not been reported.			
	Ex.: I (a) Contusion of arm and fracture of skull  (b) Fall from scaffolding			
	Code to fall on and from scaffolding (W12) as underlying cause of death. As main injury, code fracture of skull and facial bones, part unspecified (S02.9). Superficial injury of upper limb, level unspecified (T11.0) is ignored.			
	b) When serious (non-superficial and non-trivial) injuries are reported in both Part I and Part II, select the main injury from Part I. This applies even when the injuries mentioned in Part II have a higher rank on the <i>Priority Ranking of ICD-10 Nature of Injury Codes</i> list (see Appendix #) than the injuries mentioned in Part I.			
	Ex.: I (a) Multiple intrathoracic injuries (b) Car driver, collision with bus II Brain injuries			
	Code to car driver injured in collision with heavy transport vehicle or bus (V44.5) as underlying cause of death. As main injury, code multiple injuries of thorax (S29.7). Intracranial injury, unspecified (S06.9) has a higher rank on the priority list than multiple injuries of thorax, but multiple injuries of thorax are mentioned in Part I and take precedence of the injuries mentioned in Part II.			
	When serious injuries are reported only in Part II, select a main injury from Part II.			
	c) When more than one serious injury is reported in the relevant part of the certificate, select the main injury according to the <i>Priority Ranking of ICD-10 Nature-of-Injury Codes</i> list (see Appendix #). Note that 1 is the highest priority rank and that 6 is the lowest.			
	Ex.: I (a) Multiple intrathoracic injuries and brain injuries			

<u>(b)</u>	Car driver, collision with bus		
(V44. unspe	to car driver injured in collision with heavy transport vehicle or bus 2.5) as underlying cause of death. As main injury, code intracranial injury, ecified (S06.9), which has a higher rank on the priority list than multiple es of thorax (S29.7).		
have the same and	n one of the serious injuries reported in the relevant part of the certificate highest rank, select the first mentioned of these injuries. However, prefer wer an injury from the block T00-T07 (Injuries involving multiple body ame priority rank.		
	Multiple injuries with rupture of aorta  Car driver, collision with bus		
(V44. <u>Multi</u>	to car driver injured in collision with heavy transport vehicle or bus .5) as underlying cause of death. As main injury, code rupture of aorta. ple injuries (T07) and rupture of aorta (S25.0) have the same rank on the ty list, but a specific injury takes precedence over an injury coded in T00-		
The priority list wo	ould be placed in an appendix. The list is as follows:		
Priority Ranking o	f ICD-10 Nature-of-Injury Codes		
<u>Code</u>	Rank		
1= Highest priority	y rank		
S00-S02.0 S02.1 S02.28 S02.9 S03.0 S03.12 S03.3 S03.4-S05.6	6 4 6 3 5 6 5 6 5 6		
<u>S05.7</u> <u>S05.8S06.0</u>	<u>5</u> <u>6</u>		

S06.19	<u>2</u>		
<u>S07.0</u>	<u>5</u>		
<u>S07.1</u>	<u>1</u>		
<u>S07.89</u>	<u>3</u>		
S08.01	<u>6</u>		
<u>S08.8</u>	<u>5</u>		
<u>S08.9</u>	<u>6</u>		
<u>S09.0</u>	<u>5</u>		
<u>S09.18</u>	<u>6</u>		
<u>S09.9</u>	<u>4</u>		
<u>S10.02</u>	<u>6</u>		
<u>S11.7</u>	<u>5</u>		
<u>S11.8</u>	<u>6</u>		
<u>S11.9</u>	<u>3</u>		
<u>S12.07</u>	<u>3</u>		
<u>S12.8</u>	<u>5</u>		
<u>S12.9</u>	2 5 1 3 6 5 6 5 6 4 6 5 6 3 3 3 5 3 5 3 5 6 5 6 5 6 5 6 5 6		
<u>S13.0</u>	<u>6</u>		
<u>S13.12</u>	<u>5</u>		
<u>\$13.3</u>	<u>3</u>		
<u>\$13.4</u>	<u>5</u>		
<u>S13.6</u>	<u>6</u>		
<u>S14.0</u>	<u>5</u>		
<u>S14.1</u>	<u>3</u>		
<u>\$14.25</u>	<u>6</u>		
<u>S14.6</u>	<u>5</u>		
<u>S15</u>	<u>1</u>		
<u>S16</u>	<u>6</u>		
<u>\$17.0</u>	<u>5</u>		
<u>\$17.8</u>	<u>6</u>		
<u>S17.9</u>	<u>3</u>		
<u>S18</u>	<u>1</u>		
<u>S19.7</u>	<u>3</u>		
<u>S19.8</u>	<u>4</u>		
<u>S19.9-S21</u>	<u>3</u>		
<u>\$22.01</u>	1 6 5 6 3 1 3 4 3 5 6		
<u>S22.23</u>	<u>6</u>		

G22 4	, , , , , , , , , , , , , , , , , , ,		
<u>S22.4</u>	<u>5</u>		
<u>S22.5</u>	<u>2</u>		
<u>\$22.89</u>	<u>5</u>		
<u>S23.0</u>	<u>6</u>		
S23.12	<u>5</u>		
<u>S23.35</u>	5 2 5 6 5 6		
<u>S24</u>	<u>4</u>		
<u>S25.0</u>	1		
<u>S25.1</u>	1 5 3 5 3 2 4 3 2		
<u>S25.24</u>	3		
<u>S25.5</u>	5		
<u>S25.7</u>	3		
<u>S25.7</u> <u>S25.8</u>	2		
<u>\$25.8</u> <u>\$25.9</u>	<u>4</u>		
<u>S25.9</u> <u>S26.0</u>	<u>4</u>		
	<u>3</u>		
<u>\$26.8-\$27.6</u>			
<u>S27.7</u>	1		
<u>S27.89</u>	2		
<u>S28.01</u>	3		
<u>\$29.0</u>	<u>6</u>		
<u>\$29.7</u>	<u>3</u>		
<u>\$29.8</u>	<u>6</u>		
<u>\$29.9</u>	<u>3</u>		
<u>S30-S31.1</u>	<u>6</u>		
<u>S31.23</u>	<u>5</u>		
S31.4-S32.3	<u>6</u>		
<u>S32.4</u>	<u>5</u>		
<u>S32.5</u>	<u>6</u>		
<u>S32.78</u>	<u>5</u>		
S33.02	<u>6</u>		
<u>\$33.3</u>	<u>5</u>		
S33.46	6		
<u>S33.7</u>	5		
S34.06	6		
<u>S34.8</u>	1 2 3 6 3 6 3 6 5 6 5 6 5 6 5 6 5 6 5 6 5 6		
<u>S35.01</u>	3		
<u>S35.01</u> <u>S35.25</u>	<u>-</u> 5		
<u>\$35.25</u> <u>\$35.7</u>	<u>3</u>		
<u> </u>	<u>2</u>	<u> </u>	

T		I	I	
<u>\$35.89</u>	<u>5</u>			
<u>S36</u>	<u>3</u>			
<u>S37</u>	<u>5</u>			
<u>S38.0</u>	<u>6</u>			
<u>S38.1</u>	<u>5</u>			
S38.2-S39.0	<u>6</u>			
<u>S39.6</u>	<u>3</u>			
<u>S39.7</u>	<u>4</u>			
<u>S39.8</u>	<u>6</u>			
<u>S39.9</u>	<u>4</u>			
<u>S40-S41.7</u>	<u>6</u>			
<u>S41.8</u>	<u>5</u>			
S42.02	<u>6</u>			
<u>\$42.3</u>	<u>5</u>			
<u>S42.4</u>	<u>6</u>			
<u>S42.7</u>	<u>5</u>			
<u>S42.9</u>	<u>4</u>			
S43-S44.9	<u>6</u>			
<u>S45</u>	<u>3</u>			
<u>S46</u>	<u>6</u>			
<u>S47</u>	<u>5</u>			
<u>S48</u>	<u>3</u>			
<u>\$49.7</u>	<u>5</u>			
<u>\$49.8-\$51.9</u>	<u>6</u>			
<u>S52</u>	<u>5</u>			
<u>S53-S55.0</u>	<u>6</u>			
<u>S55.12</u>	<u>5</u>			
<u>S55.7</u>	<u>4</u>			
<u>\$55.89</u>	<u>1</u>			
<u>S56-S58</u>	<u>6</u>			
<u>S59.7</u>	<u>4</u>			
<u>\$59.8</u>	<u>6</u>			
<u>\$59.9</u>	<u>5</u>			
<u>S60-S62.7</u>	5         3         5         6         5         6         6         6         6         5         6         6         6         6         7         8         8         9 <td< th=""><th></th><th></th><th></th></td<>			
<u>S62.8</u>	<u>5</u>			
<u>S63-S65.0</u>	<u>6</u>			
<u>S65.1</u>	<u>5</u>			
<u>S65.28</u>	<u>6</u>			

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<u>S65.9</u>	<u>5</u>	
<u>S66-S68.3</u>	<u>6</u>	
<u>S68.4</u>	<u>5</u>	
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<u>S68.9</u>		
<u>S69</u>	<u>5</u>	
<u>S70-S71</u>	<u>6</u>	
<u>\$72.02</u>	<u>3</u>	
<u>\$72.34</u>	6	
<u>S72.7</u>	3	
<u>S72.8</u>	6	
<u>S72.9</u>	3	
<u>S73-S74.1</u>	6	
<u>S74.27</u>	5	
S74.89	6	
S75.01	5	
<u>\$75.2</u>	6	
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<u>\$70</u> <u>\$77.0</u>	<u>v</u> 5	
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<u>\$77.1-576.1</u> <u>\$78.9-\$79.9</u>	<u>u</u> 5	
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<u>\$83-\$85.2</u>	<u>5</u>	
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<u>\$86.9-\$87.0</u>	<u>0</u>	
<u>\$87.8</u>	<u>5</u>	
<u>S88.01</u>		
<u>S88.9</u>	<u>4</u>	

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<u>S95.1</u>	<u>3</u>			
S95.2-S97.0	<u>6</u>			
<u>S97.1</u>	<u>5</u>			
S97.8-S98.4	<u>6</u>			
S99.79	<u>5</u>			
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T01.2-T01.6	<u>6</u>			
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<u>T04.8</u>	<u>4</u>			
<u>T04.9</u>	<u>5</u>			
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<u>T06.5</u>	<u>3</u>			
<u>T06.8</u>	<u>5</u>			
<u>T07</u>	1			
<u>T08</u>	<u>4</u>			
<u>T09.0</u>	4 6 5 6 3 2			
<u>T09.1</u>	<u>5</u>			
<u>T09.2</u>	<u>6</u>			
<u>T09.3</u>	<u>3</u>			
<u>T09.4</u>	<u>2</u>			
<u>T09.5</u>	<u>6</u>			

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	Г11.89	5				
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	Γ13.03	6				
	Γ13.4	3				
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	<u> 19.38</u>	<u>6</u>				
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<u>T21.7</u>	<u>5</u>				
<u>T22.02</u>	<u>6</u>				
<u>T22.3</u>	<u>5</u>				
<u>T22.46</u>	<u>6</u>				
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<u>T23.02</u>	<u>6</u>				
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T25.46	<u> </u>				
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<u>T29.0</u>	4				
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<u>T29.3</u>					
<u>T29.46</u>	<u>6</u>				
<u>T29.7</u>	<u>5</u>				
<u>T30.0</u>	<u>3</u>				
<u>T30.12</u>	<u>6</u>				
<u>T30.34</u>	6 5 3 6 3				
<u>T30.56</u>	<u>6</u>				
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<u>T30.7</u>	<u>3</u>	
<u>T31.02</u>	<u>5</u>	
<u>T31.34</u>	<u>4</u>	
T31.56	3	
<u>T31.79</u>	2	
T32.02	<u>=</u> 5	
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<u>T32.56</u>	<del>-</del> 3	
<u>T32.79</u>	<u>2</u> 2	
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	<u>0</u>	
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<u>T35.01</u>	<u>4</u>	
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<u>T35.6</u>	<u>3</u>	
<u>T35.7</u>	<u>5</u>	
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<u>T67.56</u>	<u>6</u>	
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<u>T67.9</u>	<u>5</u>	
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<u>T70.9</u>	<u>~</u> 5	
$\frac{170.5}{T71}$	<u>∠</u> 1	
<u>T73.0</u>	<u> </u>	
<u>173.0</u> <u>T73.1</u>	3       5       4       3       2       6       5       6       3       6       3       6       1       5       6       1       2       6       4       2       6       5       6       5       1       3       1       3       5       6       5       1       3       5       6       5       1       3       5       6       5       1       3       5       6       5       1       3       2       4       3       5       6       5       6       5       6       5       6       5       6       2       6       3       6       2       6       3 <t< th=""><th></th></t<>	
<u>T73.2</u>	<u>6</u>	

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<u>T73.3</u>	<u>5</u>				
<u>T73.8-T74</u>	<u>5</u> <u>6</u>				
<u>T75.0</u>	<u>4</u>				
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<u>T75.23</u>	<u>6</u>				
<u>T75.4</u>	<u>3</u>				
<u>T75.8</u>	<u>6</u>				
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<u>T90.9</u>	<u>3</u>				
<u>T91.01</u>	<u>6</u>				
<u>T91.23</u>	<u>4</u>				
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<u>T93.23</u>	<u>6</u>				
<u>T93.4</u>	<u>5</u>				
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<u>T94.01</u>	<u>3</u>				
<u>T95.0</u>	<u>6</u>				
<u>T95.1</u>	<u>5</u>				
<u>T95.23</u>	4 2 6 3 6 6 3 6 4 3 6 1 5 6 3 6 5 6 5 6 5 6 5 6 5 6 5 6 5 6 5 6 5 6 5 6 5 6 6 5 6 6 6 7 8 8 8 8 8 8 8 8 8 8 8 8 8				
<u>T95.89</u>	<u>3</u>				
<u>T98.01</u>	<u>1</u>				
<u>T98.2</u>	<u>6</u>				
4.2.12 External cause		MRG	October 2006	Minor	January 2008
The codes for external	causes (V01-Y89) should be used as the primary codes for single-	(URC:1063)			
condition coding and t	abulation of the underlying cause when, and only when, the morbid				
	e to Chapter XIX (Injury, poisoning and certain other consequences of				
external causes).				1	

Add text p. 118	When the morbid condition is classified to Chapters I-XVIII, the morbid condition itself should be coded as the underlying cause and categories from the chapter for external causes may be used, if desired, as supplementary codes.  When a sequence of external events is reported, apply the General Principle and the selection rules in the normal way, and select the first external event that affected the decedent.  Example: I (a) Hypothermia (b) Exposure to cold (c) Driver of car, left road, rolled down embankment, trapped in car 3 days before discovery Code to driver of car injured in noncollision transport accident (V48.5)				
Add text	When the certifier uses "either or", or a synonymous expression to indicate that death was due to either one cause of death or another, apply the following instructions.  1. One condition, either one site or another	MRG URC 1859	October 2011	Major	January 2013
	a. Code to the residual category for the group or anatomical system in which the reported sites are classified.				
	Ex.: I (a) Cancer of kidney or bladder  Code to malignant neoplasm, urinary organ, unspecified (C68.9).				
	b. If the reported sites are in different anatomical systems or if there is no residual category for the group or anatomical system, code to the residual category for the disease or condition specified.				
	Ex.: I (a) Cancer of adrenal or kidney  Code to primary malignant neoplasm, primary site unspecified (C80.9), since adrenal  and kidney are in different anatomical systems.				
	<ul><li>2. One site or system, <i>either</i> one condition <i>or</i> another</li><li>a. If the reported conditions are classifiable to different four character subcategories of the</li></ul>				
	same three character category, code to the four-character subcategory for "unspecified".  Ex.: I (a) Arteriosclerotic heart disease or coronary aneurysm				

	Code to chronic ischemic heart disease, unspecified (I25.9).				
	b. If the reported conditions are classifiable to different three character categories but ICD- 10 provides a residual category for the disease in general, code to the residual category.				
	Ex.: I (a) MI or coronary aneurysm				
	Code to the residual category for ischemic heart disease (I25.9).				
	c. If the reported conditions are classifiable to different three character categories and there is no residual category for the disease in general, code to the residual category relating to the disease of the anatomical site/system.				
	Ex.: I (a) Tuberculosis or cancer of lung				
	Code to other disorders of lung (J98.4). Both conditions involve the lung.				
	Ex.: I (a) Stroke or heart attack				
	Code to other and unspecified disorders of circulatory system (I99). Both conditions are in the circulatory system.				
	3. Either one condition or another, either one site or another				
	When different diseases of different anatomical systems are reported as "either or", code to other specified general symptoms and signs (R68.8).				
	Ex.: I (a) Gallbladder colic or coronary thrombosis				
	Code to other specified general symptoms and signs (R68.8).				
	4. Either disease or injury				
	When death is reported as due to <i>either</i> a disease <i>or</i> an injury, code to other ill-defined and unspecified causes of mortality (R99).				
	Ex.: I (a) Coronary occlusion or war injuries				
	Code to other ill-defined and unspecified causes of mortality (R99).				
Page 88	4.2.14 Human Immunodeficiency Virus (HIV)	Mortality Reference	October 2001	Major	January 2003

Add text	When a blood transfusion is given as treatment for any condition (e.g. a haematological disorder) and an infected blood supply results in a HIV infection, code the HIV as the underlying cause and not the treated condition.	Group 0108			
	Example 1: I (a) Kaposi's sarcoma 1 year  (b) HIV 3 years  (c) Blood transfusion 5 years  (d) Haemophilia since birth				
	Code to HIV.				
	Example 2: I (a) Pneumocystis carinii 6 months (b) HIV 5 years (c) Ruptured spleen 7 years (d) Assault – fist fight 7 years				
	Code to HIV.				
Revise text	<b>4.2.14 Human Immunodeficiency Virus (HIV)</b> When a blood transfusion is given as treatment for any condition (e.g. a haematological disorder) and an infected blood supply results in a HIV infection, code the HIV as the underlying cause and not the treated condition.	Germany 1014	October 2006	Minor	January 2008
	Example 1: I (a) Kaposi's sarcoma 1 year (b) HIV 3 years (c) Blood transfusion 5 years (d) Haemophilia since birth				
	Code to HIV.				
	Example 2: I (a) Pneumocystis carinii[jirovecii] 6 months (b) HIV 5 years (c) Ruptured spleen 7 years (d) Assault – fist fight 7 years				
	Code to HIV.				
Revise code p. 92	(k) influenza (J09 <del>J10</del> -J11) reported as "due to" any other disease	URC (Proposed and ratified at meeting in Tokyo Oct'05)	October 2005	Major	October 2005

	<ul> <li>4.2 Notes for interpretation of entries of causes of death</li> <li>4.2.1 Assumption of intervening cause</li> <li>4.2.2 Interpretation of "highly improbable"</li> <li>4.2.3 Effect of duration on classification</li> <li>.</li> </ul>	MRG 1244	October 2007	Minor	January 2009
p. 94	4.2. <u>15</u> Death due to maternal (obstetric) causes				
Add text:	a) It is often difficult to identify a maternal death, particularly in cases of indirect obstetric causes. If there is any doubt that the cause of death is obstetrical, for example if the conditions entered in Part I are not obstetrical but there is a mention of pregnancy or delivery in Part II, additional information should be sought from the certifier. This is particularly important in countries where maternal mortality rate is high. If no additional information can be found, deaths with a mention of pregnancy and delivery in Part I should be considered obstetrical, but not deaths where pregnancy or delivery is mentioned in Part II only.  b) Note that when calculating maternal mortality rates, certain cases not coded to Chapter XV (O codes) should be included, provided that they meet the specifications outlined in section 4.2.15 a) for indirect obstetric causes. These cases are listed in the "Exclusion Note" at the beginning of Chapter XV.  c) There are cases of death due to obstetric causes that are not included in the calculation of the maternal death rate. These are those cases in which death occurs more than 42 days after delivery (see definition of "Maternal death" on page 134, Volume 2, ICD-10).				
Revise code	4.3.5 Coding rules Rule P3. No entry in sections (a) or (c)  Example 6: Liveborn; death at 2 days (a)	Korea 1915	October 2012	Minor	January 2014
Revise code	(a)				
	4.4 Morbidity 4.4.1 Guidelines for recording diagnostic information for single condition analysis of morbidity data	Japan 1873	October 2012	Minor	January 2014
	Specificity and detail				

Revise text • Diabetic cataract, insulin dependent type 1 Guidelines for coding "main condition" and "other conditions" 4.4.2 Optional additional codes Coding of combination categories Example 11 Main condition: Cataract. Insulin dependent Type 1 diabetes mellitus Hypertension Other conditions: Specialty: Ophthalmology Code to insulin dependent type 1 diabetes mellitus with ophthalmic complications (E10.3†) and diabetic cataract (H28.0\*) as the "main condition". Example 12 Main condition: Non insulin dependent Type 2 diabetes mellitus Other conditions: Hypertension Rheumatoid arthritis Cataract Specialty: General medicine Code to non-insulin dependent type 2 diabetes mellitus without complications (E11.9) as "main condition". Note that in this example the linkage of cataract with diabetes must not be made since they are not both recorded under "main condition". 4.4.3 Rules for reselection when the main condition is incorrectly recorded Rules for reselection of main condition Rule MB3. Condition recorded as "main condition" Is presenting symptom of diagnosed, treated condition Example 12 Main condition: Coma Other conditions: Ischaemic heart disease Otosclerosis Type 1 Ddiabetes mellitus, insulin dependent

	Specialty: Endocrinology Care: Establishment of correct dose of insulin				
	Reselect <u>type 1</u> diabetes mellitus <del>, insulin dependent</del> as the "main condition" and code to E10.0. The information provided indicates that the coma was due to diabetes mellitus and coma is taken into account as it modifies the coding.				
	4.4.4 Chapter-specific notes Chapter IV: Endocrine, nutritional and metabolic diseases				
	E10-E14 Diabetes mellitus				
	Example 13  Main condition: Type 1 insulin dependent diabetic with nephropathy, gangrene and cataracts  Other conditions: —				
	Code to type 1 insulin dependent diabetes mellitus with multiple complications (E10.7). Codes E10.2† and N08.3* (Type 1 insulin dependent diabetes with nephropathy), E10.5 (Type 1 insulin dependent diabetes with peripheral circulatory complications) and E10.3† and H28.0* (Type 1 insulin dependent diabetes with cataract) may be added as optional additional codes to identify the individual complications				
Page 119	4.4 Morbidity	WHO	October 1997		January 1999
	4.4.4 Chapter-specific notes				
Add heading	Chapter VIII: Diseases of the ear and mastoid process				
	H90-H91 Hearing loss				
	These codes are not to be used				
Revise category title	4.4 Morbidity	WHO 1018		Major	January 2008
page 126	4.4.4 Chapter-specific notes				
	Chapter VII: Diseases of the eye and adnexa				
	H54 Blindness and low vision Visual impairment including blindness (binocular or monocular)				
	This code is not to be used as the preferred code for the "main condition" if the cause is recorded, unless the episode of care was mainly for the blindness itself. When coding to the				
	cause, H54 may be used as an optional additional code.				

Add text	4.4.4 Chapter-specific notes  Chapter II: Neoplasms  C79.9 Secondary malignant neoplasm, unspecified site  C79.9 should be used for "main condition" coding only when the malignancy is described as 'disseminated carcinomatosis' or 'generalised malignancy' (or other similar terms as described in the inclusion list for C79.9) and the specific sites are not documented.	1603 Canada	October 2009	Minor	January 2011
Add codes and text	4.4.4 C80 Malignant neoplasm without specification of site C80.0 Malignant neoplasm, primary site unknown, so stated C80.9 Malignant neoplasm, primary site unspecified C80 should be used for "main condition" coding only when the health care practitioner has clearly recorded the neoplasm as an unknown primary site or as an unspecified malignancy, assumed primary.	1603 Canada	October 2009	Minor	January 2011
Delete text	4.4.4  C97 Malignant neoplasm of independent (primary) multiple sites  C80 should be used for "main condition" coding only when the health care practitioner has clearly recorded the neoplasm in such a manner. C97 should be used when  Revise text:  Example 9 Main condition: Carcinomatosis  Other conditions: —  Code to secondary malignant neoplasm, unspecified site (C79.9) malignant neoplasm without specification of site (C80). C80.9 (Malignant neoplasm, primary site unspecified)  may be used as an additional code if the primary site is unspecified.). An appropriate code from Chapter XXI for personal history of neoplasm should be used for a primary neoplasm that is no longer present.	Canada 1603	October 2009	Minor	January 2011
Paste these recommendati ons into Volume 2 after page 138 and before page 139.	Recommendations  1. Responsibility for medical certification of cause of death (see section 5.2)  The medical certification of the cause of death is normally the responsibility of the attending physician. In the case of deaths certified by coroners or other legal authorities, the medical evidence supplied to the certifier should be stated on the certificate in addition to any legal findings.	MRG 0113	October 2002	Major	January 2006

2. Form of medical certificate of cause of death (see sections 5.2, 4.1.3, and 4.3.1)

The medical certificate of cause of death should be in line with the international recommendation (see section 4.1.3). Collection of perinatal mortality statistics should be consistent with the recommendations presented in section 4.3.1.

3. Confidentiality of medical information (see section 5.2)

Administrative procedures should ensure the confidentiality of data from the death certificate or other medical records.

4. Selection of the cause for mortality tabulation (see section 4.1.1)

The causes of death to be entered on the medical certificate of cause of death are all diseases, morbid conditions or injuries resulting in or contributing to death and the circumstances of the accident or violence resulting in injuries. When only one cause of death is recorded, this cause is selected for tabulation. When more than one cause of death is recorded, selection should be made in accordance with the rules and guidelines given in the ICD.

5. Use of the International Classification of Diseases (see sections 2.1, 2.2, and 3.3)

The purpose of the ICD is to permit the systematic recording, analysis, interpretation and comparison of mortality and morbidity data collected in different countries or areas and at different times. The "core" classification of ICD-10 is the three-character code, which is the mandatory level of coding for international reporting to the WHO mortality database and for general international comparisons. The four-character subcategories, while not mandatory for reporting at the international level, are recommended for many purposes and form an integral part of the ICD, as do the special tabulation lists.

Mortality and morbidity statistics should be coded according to the tabular list of inclusions and the alphabetical index. Fourth-character subcategories, when published, should be those of the ICD. Any additions or variations should be indicated in published statistical tables.

6. Perinatal mortality statistics (see sections 5.7.2 and 5.7.3)

It is recommended that all fetuses and infants weighing at least 500 g at birth, whether alive or dead, should be included in *national* statistics. When information on birth weight is unavailable, the corresponding criteria for gestational age (22 completed weeks) or body length (25 cm crown-heel) should be used. The criteria for deciding whether an event has taken place within the perinatal period should be applied in the

order: (1) birth weight, (2) gestational age, (3) crown-heel length. The inclusion of fetuses and infants weighing between 500 g and 1000 g in national statistics is recommended both because of its inherent value and because it improves the coverage of reporting at 1000 g and over.

In statistics for international comparison, inclusion of the extremely low-birth-weight group disrupts the validity of comparisons and is not recommended. Countries should also present statistics in which both the numerator and the denominator of all ratios and rates are restricted to fetuses and infants weighing 1000 g or more (weight-specific ratios and rates); where information on birth weight is not available, the corresponding gestational age (28 completed weeks) or body length (35 cm crown-heel) should be used.

#### 7. Maternal mortality statistics (see sections 5.8.2 and 5.8.3)

Published maternal mortality rates should always specify the numerator, which can be given as: the number of recorded direct obstetric deaths, or the number of recorded obstetric deaths (direct plus indirect). For the purpose of international reporting of maternal mortality, only those maternal deaths occurring before the end of the 42-day reference period should be included in the calculation of the various ratios and rates, although the recording of later deaths is useful for national analytical purposes.

#### 8. Statistical tables (see sections 5.6.1 and 5.7.4)

The degree of detail in cross-classification by cause, sex, age, and geographical area will depend both on the purpose and range of the statistics and on the practical limits to their tabulation. Standard ways of presenting statistics are described in sections 5.6.1 and 5.7.4 to promote international compatibility.

#### 9. Tabulation of causes of death (see sections 5.6.2 and 5.6.4)

Statistics of causes of death for a defined area should be in accordance with recommendations in section 5.6.1. Deaths should preferably be classified by sex and age group as in recommendations in section 5.6.1. For statistics of perinatal mortality, full-scale multiple-cause analysis of all conditions reported will be of greatest benefit. Where such analysis is impracticable, analysis of the main disease or condition in the fetus or infant and of the main maternal condition affecting the fetus or infant with cross-tabulation of groups of these two conditions should be regarded as the minimum. Where it is necessary to select only one condition, the main disease or condition in the fetus or infant should be selected.

Page 141 Revise text:	5.8.1 – Definitions Maternal death Late maternal death  Pregnancy-related death Death occurring during pregnancy, childbirth and puerperium  A pregnancy related death occurring during pregnancy, childbirth and puerperium is the death of a woman while pregnant or within 42 days of termination of pregnancy, irrespective of the cause of death (obstetric and non obstetric).	MRG 1242	October 2007	Minor	January 2009
Page 141 Replace term	Pregnancy-related death-Death occurring during pregnancy, childbirth and puerperium  A pregnancy related death occurring during pregnancy, childbirth and puerperium is the death of a woman while pregnant or within 42 days of termination of pregnancy, irrespective of the cause of death (obstetric and non obstetric).	MRG 1242	October 2007	Minor	January 2009
p. 143	5.8.4 Denominators for maternal mortality  Pregnancy-related mortality Ratio for death occurring during pregnancy, childbirth and puerperium  Pregnancy related dDeaths-occurring during pregnancy, childbirth and puerperium x k  Live birth				
Page 142 Revise text:	5.8.3 Published maternal mortality rates It should be noted that maternal deaths from HIV disease (B20 B24) and obstetrical tetanus (A34) are coded to Chapter I. Care must be taken to include such cases in the maternal mortality rate. Note that when calculating maternal mortality rates, cases not coded to Chapter XV (O codes) should be included. These include those categories presented in the "Exclusion Note" at the beginning of Chapter XV, provided that they meet the specifications outlined in section 4.2.15 a) for indirect obstetric causes.	MRG 1244	October 2007	Minor	January 2009

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Page 142	5.8.3 Published maternal mortality rates	Canada	January 2008	Major	January 2010
		1187			
Revise text:	It should be noted that maternal deaths from HIV disease (B20 B24) and obstetrical tetanus				
	(A34) are coded to Chapter 1. Care must be taken to include such cases in the maternal				
	mortality rate.				

The following list is to be included as an Appendix to Volume 2.

Reference: Decision date - October 2001. Mortality Reference Group (URC: 0109). Minor change for implementation in January 2003.

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	7.1	List of conditions unlikely to cause death	Page xxx

## Appendix 7.1

## List of conditions unlikely to cause death

Code	Category or subcategory
A31.1	Cutaneous mycobacterial infection
A42.8	Other forms of cutaneous actinomycosis
A60.0	Herpesviral infection of genitalia and urogenital tract
A71.0 – A71.9	Trachoma
A74.0	Chlamydial conjunctivitis
B00.2	Herpesviral gingivostomatitis
B00.5	Herpesviral ocular disease
B00.8	Herpesviral whitlow
B07	Viral warts
B08.1	Molluscum contagiosum
B08.8	Foot and mouth disease
B30.0 – B30.9	Viral conjunctivitis
B35.0 – B35.9	Dermatophytosis
B36.0 – B36.9	Other superficial mycoses
B85.0 - B85.4	Pediculosis and phthiriasis
F45.3 – F45.9	Somatoform disorders
F50.1, F50.3 – F50.9	Eating disorders
F51.0 – F51.9	Nonorganic sleep disorders
F52.0 – F52.9	Sexual dysfunction, not caused by organic disorder or disease
F60.0 – F60.9	Specific personality disorders
F61	Mixed and other personality disorders
F62.0 – F62.9	Enduring personality changes, not attributable to brain damage and disease
F63.0 – F63.9	Habit and impulse disorders
F64.0 – F64.9	Gender identity disorders
F65.0 – F65.9	Disorders of sexual preference

F66.0 – F66.9	Psychological and behavior disorders associated with sexual development and orientation
F68.0 – F68.9	Other disorders of adult personality and behavior
F69	Unspecified disorder of adult personality and behavior
F95.0 – F95.9	Tic disorders
F98.0 – F98.9	Other behavioural and emotional disorders with an onset usually occurring in childhood and adolescence
G43.0 – G43.2, G43.8 – G43.9	Migraine, except complicated migraine (G43.3)
G44.0 – G44.2	Other headache syndromes
G45.0 – G45.9	Transient cerebral ischaemic attacks and related syndromes
G50.0 – G50.9	Disorders of trigeminal nerve
G51.0 – G51.9	Facial nerve disorders
G54.0 – G54.9	Nerve root and plexus disorders
G56.0 – G56.9	Mononeuropathies of upper limb
G57.0 – G57.9	Mononeuropathies of lower limb
G58.7	Mononeuritis multiplex
H00.0 – H00.1	Hordeolum and chalazion
H01.0 – H01.9	Other inflammation of eyelid
H02.0 – H02.9	Other disorders of eyelid
H04.0 – H04.9	Disorders of lacrimal system
H10.0 – H10.9	Conjunctivitis
H11.0 – H11.9	Other disorders of conjunctiva
H15.0 – H15.9	Disorders of sclera
H16.0 – H16.9	Keratitis
H17.0 – H17.9	Corneal scars and opacities
H18.0 – H18.9	Other disorders of cornea
H20.0 – H20.9	Iridocyclitis
H21.0 – H21.9	Other disorders of iris and ciliary body
H25.0 – H25.9	Senile cataract
H26.0 – H26.9	Other cataract
H27.0 – H27.9	Other disorders of lens
H30.0 – H30.9	Chorioretinal inflammation
H31.0 – H31.9	Other disorders of choroid
H33.0 – H33.5	Retinal detachments and breaks
H34.0 – H34.9	Retinal vascular occlusions
H35.0 – H35.9	Other retinal disorders
H40.0 – H40.9	Glaucoma
H43.0 – H43.9	Disorders of vitreous body
H46	Optic neuritis
H47.0 – H47.7	Other disorders of optic (2 <sup>nd</sup> ) nerve and visual pathways
H49.0 – H49.9	Paralytic strabismus
H50.0 – H50.9	Other strabismus
H51.0 – H51.9	Other disorders of binocular movement
H52.0 – H52.7	Disorders of refraction and accommodation

1152 0 1152 0	Viscos 1 distriction
H53.0 – H53.9	Visual disturbances Blindness and low vision
H54.0 – H54.9 H55	
	Nystagmus and other irregular eye movements
H57.0 – H57.9	Other disorders of eye and adnexa
H59.0 – H59.9	Postprocedural disorders of eye and adnexa, not elsewhere classified
H60.0 – H60.9	Other disorders of external acr
H61.0 – H61.9	Other disorders of external ear
H80.0 – H80.9	Otosclerosis
H83.3 – H83.9	Other diseases of inner ear
H90.0 – H90.8	Conductive and sensorineural hearing loss
H91.0 – H91.9	Other hearing loss
H92.0 – H92.2	Otalgia and effusion of ear
H93.0 – H93.9	Other disorders of ear, not elsewhere classified
J00	Acute nasopharyngitis (common cold)
J06.0 – J06.9	Acute upper respiratory infections of multiple and unspecified sites
J30.0 - J30.4	Vasomotor and allergic rhinitis
J33.0 – J33.9	Nasal polyp
J34.2	Deviated nasal septum
J35.0 – J35.9	Chronic disease of tonsils and adenoids
K00.0 - K00.9	Disorders of tooth development and eruption
K01.0 - K01.1	Embedded and impacted teeth
K02.0 - K02.9	Dental caries
K03.0 - K03.9	Other diseases of hard tissues of teeth
K04.0 - K04.9	Diseases of pulp and periapical tissues
K05.0 - K05.6	Gingivitis and periodontal diseases
K06.0 - K06.9	Other disorders of gingiva and edentulous alveolar ridge
K07.0 - K07.9	Dentofacial anomalies (including malocclusion)
K08.0 - K08.9	Other disorders of teeth and supporting structures
K09.0 – K09.9	Cyst of oral region, not elsewhere classified
K10.0 – K10.9	Other diseases of jaws
K11.0 – K11.9	Diseases of the salivary glands
K14.0 – K14.9	Diseases of tongue
L01.0 – L01.1	Impetigo (for infants over 1 year of age)
L03.0	Cellulitis of finger and toe
L04.0 – L04.9	Acute lymphadenitis
L05.0 – L05.9	Pilonidal cyst
L08.0 – L08.8	Other local infections of skin and subcutaneous tissue
L20.0 – L20.9	Atopic dermatitis
L21.0 – L21.9	Seborrhoeic dermatitis
L22	Diaper (napkin) dermatitis
L23.0 – L23.9	Allergic contact dermatitis
L24.0 – L24.9	Irritant contact dermatitis

L25.0 – L25.9	Unspecified contact dermatitis
L28.0 – L28.2	Lichen simplex chronicus and prurigo
L29.0 – L29.9	Pruritus
L30.0 – L30.9	Other dermatitis
L41.0 – L41.9	Parapsoriasis
L42	Pityriasis rosea
L43.0 – L43.9	Lichen planus
L44.0 – L44.9	Other papulosquamous disorders
L55.0 – L55.1, L55.8 – L55.9	Sunburn, except sunburn of third degree (L55.2)
L56.0 – L56.9	Other acute skin changes due to ultraviolet radiation
L57.0 – L57.9	Skin changes due to chronic exposure to nonionizing radiation
L58.0 – L58.9	Radiodermatitis
L59.0 – L59.9	Other disorders of skin and subcutaneous tissue related to radiation
L60.0 – L60.9	Nail disorders
L63.0 – L63.9	Alopecia areata
L64.0 – L64.9	Androgenic alopecia
L65.0 – L65.9	Other nonscarring hair loss
L66.0 – L66.9	Cicatricial alopecia (scarring hair loss)
L67.0 – L67.9	Hair colour and hair shaft abnormalities
L68.0 – L68.9	Hypertrichosis
L70.0 – L70.9	Acne
L72.0 – L72.9	Follicular cysts of skin and subcutaneous tissue
L73.0 – L73.9	Other follicular disorders
L74.0 – L74.9	Eccrine sweat disorders
L75.0 – L75.9	Apocrine sweat disorders
L80	Vitiligo
L81.0 – L81.9	Other disorders of pigmentation
L83	Acanthosis nigricans
L84	Corns and callosities
L85.0 – L85.9	Other epidermal thickening
L87.0 – L87.9	Transepidermal elimination disorders
L90.0 – L90.9	Atrophic disorders of skin
L91.0 – L91.9	Hypertrophic disorders of skin
L92.0 – L92.9	Granulomatous disorders of skin and subcutaneous tissue
L94.0 – L94.9	Other localized connective tissue disorders
L98.0 – L98.3, L98.5-L95.9	Other disorders of skin and subcutaneous tissue, not elsewhere classified
M20.0 - M20.6	Acquired deformities of fingers and toes
M21.0 - M21.9	Other acquired deformities of limbs
M22.0 - M22.9	Disorders of patella
M23.0 - M23.9	Internal derangement of knee
M24.0 - M24.9	Other specific joint derangements
M25.0 - M25.9	Other joint disorders, not elsewhere classified

M35.3	Polymyalgia rheumatica
M40.0 - M40.5	Kyphosis and lordosis
M43.6	Torticollis, unspecified
M43.8 - M43.9	Other and deforming dorsopathies
M48.0	Spinal stenosis in cervical region
M53.0 - M53.9	Other dorsopathies, not elsewhere classified
M54.0 - M54.9	Dorsalgia
M60.0 - M60.9	Myositis
M65.0 - M65.9	Synovitis and tenosynovitis
M66.0 - M66.5	Spontaneous rupture of synovium and tendon
M67.0 - M67.9	Other disorders of synovium and tendon
M70.0 - M70.9	Soft tissue disorders related to use, overuse and pressure
M71.0 - M71.9	Other bursopathies
M72.5	Fasciitis, not elsewhere classified, except necrotizing fasciitis
M75.0 - M75.9	Shoulder lesions
M76.0 - M76.9	Enthesopathies of lower limb, excluding foot
M77.0 - M77.9	Other enthesopathies
M79.0 - M79.9	Other soft tissue disorders, not elsewhere classified
M95.0 – M95.9	Other acquired deformities of musculoskeletal system and connective tissue
M99.0 – M99.9	Biomechanical lesions, not elsewhere classified
N39.3	Stress incontinence
N46	Male infertility
N47	Redundant prepuce, phimosis, and paraphimosis
N60.0 – N60.9	Benign mammary dysplasia
N84.0 – N84.9	Polyp of female genital tract
N85.0 – N85.9	Other noninflammatory disorders of uterus, except cervix
N86	Erosion and ectropion of cervix uteri
N87.0 – N87.9	Dysplasia of cervix uteri
N88.0 – N88.9	Other noninflammatory disorders of cervix uteri
N89.0 – N89.9	Other noninflammatory disorders of vagina
N90.0 – N90.9	Other noninflammatory disorders of vulva and perineum
N91.0 – N91.5	Absent, scanty, and rare menstruation
N92.0 – N92.9	Excessive, frequent, and irregular menstruation
N93.0 – N93.9	Other abnormal uterine and vaginal bleeding
N94.0 – N94.9	Pain and other conditions associated with female genital organs and menstrual cycle
N96	Habitual aborter
N97.0 – N97.9	Female infertility
Q10.0 – Q10.7	Congenital malformations of eyelid, lacrimal apparatus, and orbit
Q11.0 – Q11.3	Anophthalmos, microphthalmos and macrophthalmos
Q12.0 – Q12.9	Congenital lens malformations
Q13.0 – Q13.9	Congenital malformations of anterior segment of eye
Q14.0 – Q14.9	Congenital malformations of posterior segment of eye

Q15.0 – Q15.9	Other congenital malformations of eye
Q16.0 – Q16.9	Congenital malformations of ear causing impairment of hearing
Q17.0 – Q17.9	Other congenital malformations of ear
Q18.0 – Q18.9	Other congenital malformations of face and neck
Q38.1	Tongue tie
Q65.0 – Q65.9	Congenital deformities of hip
Q66.0 – Q66.9	Congenital deformities of feet
Q67.0 – Q67.8	Congenital musculoskeletal deformities of head, face, spine and chest
Q68.0 – Q68.8	Other congenital musculoskeletal deformities
Q69.0 – Q69.9	Polydactyly
Q70.0 – Q70.9	Syndactyly
Q71.0 – Q71.9	Reduction defects of upper limb
Q72.0 – Q72.9	Reduction defects of lower limb
Q73.0 – Q73.8	Reduction defects of unspecified limb
Q74.0 – Q74.9	Other congenital malformations of limb(s)
Q80.0 – Q80.3, Q80.8 – Q80.9	Congenital ichthyosis, except Harlequin fetus (Q80.4)
Q81.0	Epidermolysis bullosa simplex
Q81.2 – Q81.9	Other forms of epidermolysis bullosa, except epidermolysis bullosa letalis (Q81.1)
Q82.0 – Q82.9	Other congenital malformations of skin
Q83.0 – Q83.9	Congenital malformations of breast
Q84.0 – Q84.9	Other congenital malformations of integument
S00.0 – S00.9	Superficial injury of head
S05.0, S05.1, S05.8	Superficial injuries (any type) of eye and orbit (any part)
S10.0 – S10.9	Superficial injury of neck
S20.0 – S20.8	Superficial injury of thorax
S30.0 – S30.9	Superficial injury of abdomen, lower back and pelvis
S40.0 – S40.9	Superficial injury of shoulder and upper arm
S50.0 – S50.9	Superficial injury of forearm
S60.0 – S60.9	Superficial injury of wrist and hand
S70.0 – S70.9	Superficial injury of hip and thigh
S80.0 – S80.9	Superficial injury of lower leg
S90.0 – S90.9	Superficial injury of ankle and foot
T09.0	Superficial injury of trunk, level unspecified
T11.0	Superficial injury of upper limb, level unspecified
T13.0	Superficial injury of lower limb, level unspecified
T14.0	Superficial injury of unspecified body region
T20.1	Burn of first degree of head and neck
T21.1	Burn of first degree of trunk
T22.1	Burn of first degree of shoulder and upper limb, except wrist and hand
T23.1	Burn of first degree of wrist and hand
T24.1	
	Burn of first degree of hip and lower limb except ankle and foot

	Append	ix 7.1	MRG 0122	October 2002	Minor	January 2004
	List of conditions unlikely to cause	death				
	Code Category or subcate H54.0 – H54.7 Blindness and low	ntegory vision				
Revise code	H59.0 H59.9 Postprocedural disc	orders of eye and adnexa, not elsewhere				
Delete codes and text	classified	•				
Delete code And text	M72.5 Fasciitis, not elsew fasciitis	here classified, except necrotizing				
Revise code		t, and irregular menstruation				
	<ul><li>7. Appendices</li><li>7.1 List of conditions unlikely to</li></ul>	o cause death (see 4.1.9, Rule B)	MRG 1121	October 2007	Minor	January 2009
Revise text:	7.1 List of conditions unlikely to	Cause death (see 4.1.9, Rule B)	1121			
~p. 162	Code Category or subc	ategory				
	_	ler of adult personality and behaviour				
	F80-F89 Disorders of psych	ological development				
	F95.0–F95.9 Tic disorders					
	Appendix 7.2		MRG 1865	October 2011	Minor	January 2013
	7.2 List of conditions that can cause	e diabetes				
	Acceptable sequences for diabetes "d	lue to" other diseases				
	Type of Diabetes	<b>Due to</b>				
	E10	B25.2 E40-E46 E63.9 E64.0				

		-	-	-	
	<u>E64.9</u>				
	M35.9				
	P35.0				
E11	<u>E24</u>				
	E40-E46				
	<u>E63.9</u>				
	<u>E64.0</u>				
	<u>E64.9</u>				
	<u>M35.9</u>				
	<u>O24.4</u>				
	<u>P35.0</u>				
E12	E40-E46				
	E63.9				
	<u>E64.0</u>				
	<u>E64.9</u>				
E13	B25.2				
	B26.3				
	C25				
	C78.8 (pancreas only)	<u> </u>			
	D13.6-D13.7				
	D35.0				
	E05-E06				
	E22.0				
	E24				
	E40 E46				
	E80.0-E80.2				
	E83.1				
	E84				
	E89.1				
	F10.1-F10.2				
	G10				
	G11.1				
	G25.8				
	G71.1				
	K85				
	K86.0-K86.1				
	K86.8-K86.9				
	M35.9				
	O24.4				

	P35.0			
	Q87.1			
	Q90			
	Q96			
	Q98			
	Q99.8			
	S36.2			
	T37.3			
	T37.5			
	T20 0 T20 1			
	T38.0-T38.1			
	T42.0			
	T46.5			
	T46.7			
	T50.2			
	<del>X41</del>			
	<del>X44</del>			
	<del>X61</del>			
	<del>X64</del>			
	<del>Y11</del>			
	<del>Y14</del>			
	Y41.3			
	Y41.5			
	Y42.0-Y42.1			
	Y46.2			
	Y52.5			
	Y52.7			
	Y54.3			
E14	B25.2			
	B26.3			
	C25			
	C78.8 (pancreas or	<u>ıly)</u>		
	D13.6-D13.7			
	D35.0			
	E05-E06			
	E22.0			
	E24			
	E40-E46			
	E63.9			
	E64.0			
	<u>E64.0</u> <u>E64.9</u>			
	E80.0-E80.2			

P00.1
E83.1
E84
E89.1
F10.1-F10.2
G10
G11.1
G25.8
G71.1
K85
K86.0-K86.1
K86.8-K86.9
M35.9
O24.4
P35.0
Q87.1
Q90
Q96
Q98
Q99.8
S36.2
T37.3
T37.5
T38.0-T38.1
T42.0
T46.5
T46.7
T50.2
<del>X41</del>
<del>X</del> 44
<del>X61</del>
<del>X64</del>
<del>¥11</del>
<del>Y14</del>
Y41.3
Y41.5
Y42.0-Y42.1
Y46.2
Y52.5
Y52.7
Y54.3
1 77.7

Includes proposals ratified by the WHO-FIC Network at the annual meeting in Brasilia, Oct	tober 2012		

Includes proposals ratified by the WHO-FIC Network at the annual meeting in Brasilia, October 2012

# Index

Instruction	Instruction manual entries	Source	Date approved	Major/ Minor update	Implementation date
p. 171-177	Index	MRG 1130	October 2007	Minor	January 2010
Add and revise	Accepted sequences for coding 71				
terms in the index:	"Highly improbable" relationships 71				
	Rejected sequences for coding 71				
p. 172 Add and revise terms:	Index  Death occurring during pregnancy, childbirth and puerperium 141	MRG 1242	October 2007	Minor	January 2009
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