Scottish Clinical Coding Standards – ICD-10

Coding of COVID-19 Guidance

COVID-19, the clinical syndrome caused by the novel coronavirus ‘Severe Acute Respiratory Syndrome Coronavirus-2’ (SARS-CoV-2), (formerly known as 2019-nCoV) has been declared a pandemic by the World Health Organisation (WHO).

In response, WHO has assigned the ICD-10 emergency use codes U07.1 and U07.2 as follows:

- An emergency ICD-10 code of **U07.1 COVID-19, virus identified** is assigned to a disease diagnosis of COVID-19 confirmed by laboratory testing.
- An emergency ICD-10 code of **U07.2 COVID-19, virus not identified** is assigned to a clinical or epidemiological diagnosis of COVID-19 where laboratory confirmation is inconclusive or not available.

WHO have issued an official update to the published volumes of ICD-10 Volume 1 Tabular List and Volume 3 Alphabetical Index. The details of how to access these are at the end of the standard and the electronic update ‘COVID-19 update for ICD-10’ is available on the WHO website [https://www.who.int/classifications/icd/icd10updates/en/](https://www.who.int/classifications/icd/icd10updates/en/)

Coding Guidance for SMR records

This standard details how COVID-19 should be coded on SMR records in NHS Scotland from immediate effect and supersedes Coding Standards No 22 February 2020.

This guidance applies to SMR01, SMR02, and SMR04 records.

There are five main coding scenarios related to COVID-19:

1. **COVID-19 confirmed by laboratory testing**
2. **COVID-19 diagnosed clinically (testing not performed or inconclusive)**
3. **COVID-19 ruled out**
4. **Non COVID-19 coronavirus**
5. **Coronavirus NOS**

Please note, there are many synonymous terms used for COVID-19, including:

- COVID-19 (*various versions in terms of capital letters and small letters*)
- COVID/Covid (*no number specification*)
- 2019 Coronavirus
- SARS-CoV-2
- 2019-nCoV
- Novel Coronavirus
COVID-19 related coding scenarios

1. COVID-19 confirmed by laboratory testing

For patients in whom laboratory testing has confirmed COVID-19, **U07.1 COVID-19, virus identified** should be assigned.

Manifestations of the disease (i.e. associated conditions, signs and/or symptoms) should also be coded if known and always be sequenced after the **U07.1** code.

If the patient is asymptomatic i.e. has no manifestations of COVID-19 disease, **U07.1** can be used alone as long as laboratory testing has confirmed COVID-19.

**U07.1** should also be used in cases where COVID-19 has been confirmed by laboratory testing, but there is no clear clinical statement attributing the patient’s conditions/symptoms to the positive test result (see examples 'c' and 'd' below). This contravenes the normal coding rules as per [CG 20 June 2007](#). This is only applicable to the use of **U07.1** for the COVID-19 pandemic and does not apply to any other ICD-10 codes. In addition:

- If the result is not available at time of discharge, but a positive result is available at time of coding then this should be coded to **U07.1**
- Coders are advised to review laboratory test results if the COVID-19 status is unclear from the discharge letter

The majority of patients with COVID-19 confirmed by laboratory testing should have **U07.1** assigned as main condition. However, there may be exceptions when it is acceptable for **U07.1** not to be in the primary diagnosis field, which include:

- the patient is under obstetric care (SMR02):
  - In these cases, a Chapter XV code should go in 1st position followed by **U07.1** and any COVID-19 manifestation codes sequenced after **U07.1**.
  - **O98.5 Other viral diseases complicating pregnancy, childbirth and the puerperium** can be recorded as the main condition if there are no other applicable Chapter XV codes for the episode.
- the patient is under psychiatric care (SMR04):
  - In these cases, a Chapter V code should go in 1st position followed by **U07.1** and any COVID-19 manifestation codes sequenced after **U07.1**.
- a positive COVID-19 laboratory test is an incidental finding in an asymptomatic patient (another condition is being treated as main condition)
- the patient is admitted for another condition and is also diagnosed with COVID-19 (confirmed by laboratory test), but does not require any medical treatment for the
COVID-19. The other condition is specified as the main condition treated. Any manifestations of the COVID-19 disease should be sequenced after U07.1.

Note: there is no requirement to add the codes B34.2 Coronavirus infection, unspecified site or B97.2 Coronavirus as the cause of diseases classified to other chapters for COVID-19 cases. This information is captured by the U07.1 code.

Examples

a) Cough, proven to be due to COVID-19 by laboratory testing
   U07.1 COVID-19, virus identified
   R05.X Cough

b) Patient admitted with pneumonia due to COVID-19, confirmed by laboratory testing
   U07.1 COVID-19, virus identified
   J12.8 Other viral pneumonia

c) Patient admitted with persistent pyrexia. COVID-19 positive on swab result.
   U07.1 COVID-19, virus identified
   R50.8 Other specified fever

d) Patient admitted with viral infection. Laboratory test available after discharge letter completed shows proven COVID-19.
   U07.1 COVID-19, virus identified
   - B34.2 is not needed as U07.1 classifies the COVID-19 disease

e) Patient 32 weeks pregnant, admitted to obstetric ward for observation due to cough and shortness of breath due to suspected COVID-19 which was confirmed by positive laboratory testing. (SMR02 record)
   O98.5 Other viral diseases complicating pregnancy, childbirth and the puerperium
   U07.1 COVID-19, virus identified
   R05.X Cough
   R06.0 Dyspnoea

f) Patient admitted for delivery at 39 weeks and had 750ml postpartum haemorrhage. Cough noted and swab was positive for COVID-19. (SMR02 record)
   O72.1 Other immediate postpartum haemorrhage
   U07.1 COVID-19, virus identified
   R05.X Cough


g) Psychiatric inpatient being treated for schizophrenia. COVID-19 outbreak in the ward and patient tests positive for COVID-19. (SMR04 record)
   F20.9 Schizophrenia, unspecified
   U07.1 COVID-19, virus identified

h) Admitted due to fall in nursing home and fractured neck of right femur sustained. Nursing home known to have COVID-19 cases so patient swabbed as a precaution even though asymptomatic and found to be positive for COVID-19. Main condition treated confirmed as the fracture.
   S72.00 Fracture of neck of femur (closed)
2. **COVID-19 confirmed clinically (testing not performed or inconclusive)**

Clinical confirmation means that the healthcare professional (e.g. doctor, nurse) has made a clinical decision from the patient’s history, signs and symptoms that they have COVID-19. Laboratory testing has not been performed, has not been available or testing has been inconclusive.

**U07.2 COVID-19, virus not identified** should be assigned for patients who have been clinically diagnosed as having COVID-19.

Manifestations of the disease (i.e. associated conditions, signs and/or symptoms) should also be coded if known and always be sequenced after the **U07.2** code.

If the manifestations are not known, **U07.2** can still be assigned for the patient as long as a diagnosis of COVID-19 has been described by the health care provider.

**Note: U07.2 COVID-19, virus not identified** can be assigned if the responsible healthcare professional states any of the following terms in relation to COVID-19 (or any synonymous terms):

- Suspected
- Possible
- Impression of
- Probable
- Query
- Likely
- Suggestive of
- Consistent with, compatible with or in keeping with
- Treated as, for, accordingly

This contravenes the normal coding rules as per [CG25 April 2010](#). This is only applicable for the duration of the COVID-19 pandemic and will be reviewed in the future.

**Note:** the majority of patients with COVID-19 confirmed clinically (testing not performed or inconclusive) should have **U07.2** assigned as main condition. However, there may be exceptions when it is acceptable for **U07.2** not to be in the primary diagnosis field, which include:

- the patient is admitted under obstetric care (SMR02):
  - In these cases, a Chapter XV code should go in 1st position followed by **U07.2** and any COVID-19 manifestation codes sequenced after **U07.2**.
  - **O98.5 Other viral diseases complicating pregnancy, childbirth and the puerperium** can be recorded as the main condition if there are no other applicable Chapter XV codes for the episode.
• the patient is under psychiatric care (SMR04):
  ○ In these cases, a Chapter V code should go in 1st position followed by **U07.2** and any COVID-19 manifestation codes sequenced after **U07.2**.

• the patient is admitted for another condition and is also diagnosed with COVID-19 clinically, but does not require any medical treatment for the COVID-19. The other condition is specified as the main condition treated. Any manifestations of the COVID-19 disease should be sequenced after **U07.2**.

Examples

a) **Cough and pyrexia.** Doctor diagnoses COVID-19 and patient is managed with supportive IV fluids. Laboratory testing for COVID-19 not performed.
   
   **U07.2 COVID-19, virus not identified**
   **R05.X Cough**
   **R50.9 Pyrexia**

b) **Admitted with pneumonia.** Doctor suspects COVID-19 and patient is managed for COVID-19 related pneumonia with supportive IV fluids. Laboratory testing for COVID-19 was inconclusive.
   
   **U07.2 COVID-19, virus not identified**
   **J12.8 Other viral pneumonia**

c) **Patient was admitted with suspected COVID-19.** No testing was available, but due to her symptoms, she was managed as per the COVID-19 protocol.
   
   **U07.2 COVID-19, virus not identified**

d) **Patient 28 weeks pregnant, admitted to obstetric ward for observation due to cough. COVID-19 suspected.** Testing for COVID-19 was inconclusive. **(SMR02 record)**
   
   **O98.5 Other viral diseases complicating pregnancy, childbirth and the puerperium**
   **U07.2 COVID-19, virus not identified**
   **R05.X Cough**

e) **Patient admitted for delivery at 39 weeks and had 750ml postpartum haemorrhage. Cough noted and presumed to be COVID-19.** Testing not performed. **(SMR02 record)**
   
   **O72.1 Other immediate postpartum haemorrhage**
   **U07.2 COVID-19, virus not identified**
   **R05.X Cough**

f) **Psychiatric inpatient being treated for schizophrenia. COVID-19 outbreak in the ward. Patient noted to have a cough and diagnosed clinically as having COVID-19. Testing not available. **(SMR04 record)**
   
   **F20.9 Schizophrenia, unspecified**
   **U07.2 COVID-19, virus not identified**
   **R05.X Cough**

g) **Admitted due to fall in nursing home and fractured neck of right femur sustained. Patient noted to have cough and COVID-19 likely cause though no testing was available and treatment for it was not required.** Main condition treated for the...
episode confirmed as the fracture.
S72.00 Fracture of neck of femur (closed)
W19.1 Unspecified fall (Residential institution)
U07.2 COVID-19, virus not identified
R05.X Cough
- while U07.2 is not the main condition, sequencing guidance still applies and manifestations should follow the U07.2 code.

3. COVID-19 ruled out

There may be patients admitted to hospital who are initially managed as COVID-19 cases, but later are confirmed not to have the disease by laboratory testing.

When coding these patients, first record any manifestation of disease (i.e. associated conditions, signs and/or symptoms) followed by Z03.8 Observation for other suspected diseases and conditions.

Examples

a) Patient admitted with pneumonia. Initially thought to be COVID-19, but laboratory testing excluded this. Treated with antibiotics.
   J18.9 Pneumonia, unspecified
   Z03.8 Observation for other suspected diseases and conditions

b) Patient admitted with cough. Initially thought to be COVID-19 but this was ruled out by a negative lab test.
   R05.X Cough
   Z03.8 Observation for other suspected diseases and conditions

4. Non COVID-19 coronavirus

Coronaviruses are a group of viruses that can cause a variety of respiratory infections. Not all coronaviruses are the COVID-19 subtype (SARS-CoV-2). For example, other types of coronaviruses include Human coronavirus OC43 (HCoV-OC43) and Human coronavirus HKU1, both of which can cause mild symptoms similar to the common cold.

If a patient’s record details clearly states they have a coronavirus strain other than COVID-19, these should be coded as per normal coding rules. These should not be coded using U07.1 or U07.2.

Examples

a) Patient admitted with pneumonia. Swab showed Human coronavirus HKU1 so treated as coronavirus related pneumonia.
   J12.8 Other viral pneumonia
   B97.2 Coronavirus as the cause of diseases classified to other chapters

b) Patient admitted with vague symptoms and swab taken confirmed a common cold strain of coronavirus. Managed as viral infection with supportive treatment.
   B34.2 Coronavirus infection, unspecified site
5. *Coronavirus NOS*

There is a concern that the term “coronavirus” may be seen on records without further modifiers or specification that it is the pandemic strain, COVID-19. Coders may not be able to get clarification from other documentation, laboratory testing or the clinician indicating that the patient should be considered to be a COVID-19 case or not.

In such cases, the **U07.-** should not be used and the **B34.2 Coronavirus infection, unspecified site** or **B97.2 Coronavirus as the cause of diseases classified to other chapters** applied as appropriate.

However, there is also a concern that “coronavirus NOS” may be seen with the terms such as ‘suspected’, ‘possible’, ‘impression of’ etc. for which normal coding guidance would be to code the symptoms and not the virus B codes. This could mean there is a group of potential coronavirus cases that could not be identified by analysing either **U07.1/2** or **B34.2/B97.2** codes.

As such, if the only information available to coders is “coronavirus” with no confirmation of the COVID-19 strain, the codes **B34.2 Coronavirus infection, unspecified site** or **B97.2 Coronavirus as the cause of diseases classified to other chapters** should be used and this includes if the non-specific term “coronavirus” is stated in conjunction with the following terms:

- Suspected
- Possible
- Impression of
- Probable
- Query
- Likely
- Suggestive of
- Consistent with, compatible with or in keeping with
- Treated as, for, accordingly

This contravenes the normal coding rules as per [CG25 April 2010](#). This is only applicable for the duration of the COVID-19 pandemic and will be reviewed in the future.

Examples

a) *Patient admitted with coronavirus. Managed as viral infection with supportive treatment. There is no other information to clarify whether the patient was thought to be a suspected COVID-19 case or not.*

**B34.2 Coronavirus infection, unspecified site**

b) *Patient admitted with lower respiratory tract infection due to suspected coronavirus. No laboratory testing performed and no other information was available to clarify whether the patient was thought to be a suspected COVID-19 case or not.*

**J22X Unspecified acute lower respiratory infection**

**B97.2 Coronavirus as the cause of diseases classified to other chapters**
Summary of guidance

1. COVID-19 confirmed by laboratory testing
   i. U07.1
   ii. Plus, conditions/signs/symptoms (if present)

2. COVID-19 confirmed clinically (no test or test inconclusive)
   i. U07.2
   ii. Plus, conditions/signs/symptoms (if present)
      ▪ Terms “suspected/possible/impression” etc can be coded to U07.2

3. COVID-19 ruled out
   i. Conditions/signs/symptoms
   ii. Plus, Z03.8

4. Non COVID-19 coronavirus
   i. Code as per normal coding rules and standards

5. Coronavirus NOS
   i. Do NOT use U07.1 or U07.2
   ii. Code to B34.2 or manifestation codes followed by B97.2
      ▪ Terms “suspected/possible/impression” etc can be coded to B34.2/
        B97.2

This guidance supersedes any previous guidance related to COVID-19 is applicable to discharges from 1st April 2020.
ICD-10 Book Updates: Addition of COVID-19 codes

Updates to the ICD-10 Tabular List and Alphabetical Index are accessible on the WHO website- https://www.who.int/classifications/icd/icd10updates/en/

To access the ICD10 update documents, select https://www.who.int/classifications/icd/COVID-19_EmergencyUpdate.zip?ua=1

This will open a zip file of two PDF documents which contain the details of the amendments:

- Volume 1_Tabular List 2019_with Suspected COVID-19_Final.pdf
- Volume 3_Alphabetical Index 2020_Suspected COVID-19_Final (002).pdf

Please update your print and electronic ICD-10 books and with these amendments.

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