

Self-limiting respiratory tract and ear infections – antibiotic prescribing overview

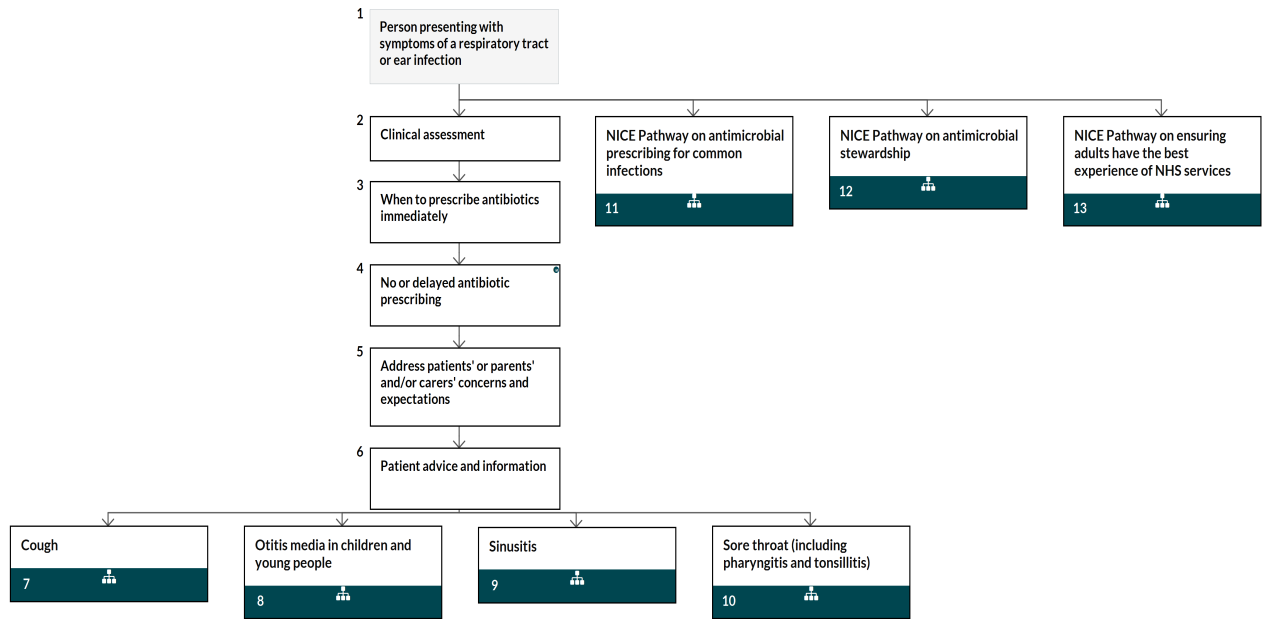
NICE Pathways bring together everything NICE says on a topic in an interactive flowchart. NICE Pathways are interactive and designed to be used online.

They are updated regularly as new NICE guidance is published. To view the latest version of this NICE Pathway see:

<http://pathways.nice.org.uk/pathways/self-limiting-respiratory-tract-and-ear-infections-antibiotic-prescribing>

NICE Pathway last updated: 30 September 2020

This document contains a single flowchart and uses numbering to link the boxes to the associated recommendations.



1 Person presenting with symptoms of a respiratory tract or ear infection

No additional information

2 Clinical assessment

At the first face-to-face contact in primary care, including walk-in centres and emergency departments, adults and children (3 months and older) presenting with a history suggestive of the following conditions should be offered a clinical assessment:

- acute otitis media
- acute sore throat/acute pharyngitis/acute tonsillitis
- common cold
- acute rhinosinusitis
- acute cough/acute bronchitis.

The clinical assessment should include a history (presenting symptoms, use of over-the-counter or self medication, previous medical history, relevant risk factors, relevant comorbidities) and, if indicated, an examination to identify relevant clinical signs.

For information about fever in children younger than 5 years, see [the NICE Pathway on fever in under 5s](#).

NICE has published clinical knowledge summaries on:

- [chest infections – adult](#)
- [common cold](#)
- [cough](#)
- [otitis media – acute](#)
- [sinusitis](#)
- [sore throat – acute](#).

These practical resources are for primary care professionals (they are not formal NICE guidance).

NICE has published medtech innovation briefings on:

- [FebriDx for C-reactive protein and myxovirus resistance protein A testing](#)
- [Alere Afinion CRP for C-reactive protein testing in primary care](#)
- [QuikRead go for C-reactive protein testing in primary care.](#)

Meningitis

If meningitis is suspected, see [the NICE Pathway on bacterial meningitis and meningococcal septicaemia in under 16s.](#)

Pneumonia

If pneumonia is suspected, see [the NICE Pathway on pneumonia.](#)

Sepsis

If sepsis is suspected, see [the NICE Pathway on sepsis.](#)

Tuberculosis

If tuberculosis is suspected, [the NICE Pathway on tuberculosis.](#)

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When to prescribe antibiotics immediately

An immediate antibiotic prescription and/or further appropriate investigation and management should only be offered to patients (both adults and children) in the following situations:

- if the patient is systemically very unwell
- if the patient has symptoms and signs suggestive of serious illness and/or complications (particularly pneumonia, mastoiditis, peritonsillar abscess, peritonsillar cellulitis, intraorbital and intracranial complications)
- if the patient is at high risk of serious complications because of pre-existing comorbidity. This includes patients with significant heart, lung, renal, liver or neuromuscular disease, immunosuppression, cystic fibrosis, and young children who were born prematurely
- if the patient is older than 65 years with acute cough and two or more of the following criteria, or older than 80 years with acute cough and one or more of the following criteria:
 - hospitalisation in previous year
 - type 1 or type 2 diabetes
 - history of congestive heart failure
 - current use of oral glucocorticoids.

For these patients, the no antibiotic prescribing strategy and the delayed antibiotic prescribing strategy should not be considered.

Depending on clinical assessment of severity, patients in the following subgroups can also be considered for an immediate antibiotic prescribing strategy (in addition to a no antibiotic or a delayed antibiotic prescribing strategy):

- bilateral acute otitis media in children younger than 2 years
- acute otitis media in children with otorrhoea
- acute sore throat/acute pharyngitis/acute tonsillitis when three or more Centor criteria are present.

See what NICE says on [pneumonia](#) and [medicines optimisation](#).

4 No or delayed antibiotic prescribing

No antibiotic prescribing

A no antibiotic prescribing strategy or a delayed antibiotic prescribing strategy should be agreed for patients with the following conditions:

- acute otitis media
- acute sore throat/acute pharyngitis/acute tonsillitis
- common cold
- acute rhinosinusitis
- acute cough/acute bronchitis.

When the no antibiotic prescribing strategy is adopted, patients should be offered:

- reassurance that antibiotics are not needed immediately because they are likely to make little difference to symptoms and may have side effects, for example, diarrhoea, vomiting and rash
- a clinical review if the condition worsens or becomes prolonged.

Delayed antibiotic prescribing

When the delayed antibiotic prescribing strategy is adopted, patients should be offered:

- reassurance that antibiotics are not needed immediately because they are likely to make little difference to symptoms and may have side effects, for example, diarrhoea, vomiting and rash

- advice about using the delayed prescription if symptoms are not starting to settle in accordance with the expected course of the illness or if a significant worsening of symptoms occurs
- advice about re-consulting if there is a significant worsening of symptoms despite using the delayed prescription.

A delayed prescription with instructions can either be given to the patient or left at an agreed location to be collected at a later date.

Quality standards

The following quality statement is relevant to this part of the interactive flowchart.

1. Antimicrobial stewardship

5 Address patients' or parents' and/or carers' concerns and expectations

Patients' or parents'/carers' concerns and expectations should be determined and addressed when agreeing the use of the three antibiotic prescribing strategies (no prescribing, delayed prescribing and immediate prescribing).

6 Patient advice and information

For all antibiotic prescribing strategies, patients should be given:

- advice about the usual natural history of the illness, including the average total length of the illness (before and after seeing the doctor):
 - acute otitis media: 4 days
 - acute sore throat/acute pharyngitis/acute tonsillitis: 1 week
 - common cold: 1.5 weeks
 - acute rhinosinusitis: 2.5 weeks
 - acute cough/acute bronchitis: 3 weeks
- advice about managing symptoms, including fever (particularly analgesics and antipyretics). For information about fever in children younger than 5 years, see what NICE says on [fever in under 5s](#).

NICE has written information for the public on [respiratory tract infections \(self-limiting\)](#):

[prescribing antibiotics.](#)

7 Cough

[See Self-limiting respiratory tract and ear infections – antibiotic prescribing / Cough – antibiotic prescribing](#)

8 Otitis media in children and young people

[See Self-limiting respiratory tract and ear infections – antibiotic prescribing / Otitis media – antibiotic prescribing](#)

9 Sinusitis

[See Self-limiting respiratory tract and ear infections – antibiotic prescribing / Sinusitis – antibiotic prescribing](#)

10 Sore throat (including pharyngitis and tonsillitis)

[See Self-limiting respiratory tract and ear infections – antibiotic prescribing / Sore throat \(including pharyngitis and tonsillitis\) – antibiotic prescribing](#)

11 NICE Pathway on antimicrobial prescribing for common infections

[See Antimicrobial prescribing for common infections](#)

12 NICE Pathway on antimicrobial stewardship

[See Antimicrobial stewardship](#)

13 NICE Pathway on ensuring adults have the best experience of NHS services

[See Patient experience in adult NHS services](#)

Sources

Respiratory tract infections (self-limiting): prescribing antibiotics (2008) NICE guideline CG69

Your responsibility

Guidelines

The recommendations in this guideline represent the view of NICE, arrived at after careful consideration of the evidence available. When exercising their judgement, professionals and practitioners are expected to take this guideline fully into account, alongside the individual needs, preferences and values of their patients or the people using their service. It is not mandatory to apply the recommendations, and the guideline does not override the responsibility to make decisions appropriate to the circumstances of the individual, in consultation with them and their families and carers or guardian.

Local commissioners and providers of healthcare have a responsibility to enable the guideline to be applied when individual professionals and people using services wish to use it. They should do so in the context of local and national priorities for funding and developing services, and in light of their duties to have due regard to the need to eliminate unlawful discrimination, to advance equality of opportunity and to reduce health inequalities. Nothing in this guideline should be interpreted in a way that would be inconsistent with complying with those duties.

Commissioners and providers have a responsibility to promote an environmentally sustainable health and care system and should assess and reduce the environmental impact of implementing NICE recommendations wherever possible.

Technology appraisals

The recommendations in this interactive flowchart represent the view of NICE, arrived at after careful consideration of the evidence available. When exercising their judgement, health professionals are expected to take these recommendations fully into account, alongside the individual needs, preferences and values of their patients. The application of the recommendations in this interactive flowchart is at the discretion of health professionals and

their individual patients and do not override the responsibility of healthcare professionals to make decisions appropriate to the circumstances of the individual patient, in consultation with the patient and/or their carer or guardian.

Commissioners and/or providers have a responsibility to provide the funding required to enable the recommendations to be applied when individual health professionals and their patients wish to use it, in accordance with the NHS Constitution. They should do so in light of their duties to have due regard to the need to eliminate unlawful discrimination, to advance equality of opportunity and to reduce health inequalities.

Commissioners and providers have a responsibility to promote an environmentally sustainable health and care system and should assess and reduce the environmental impact of implementing NICE recommendations wherever possible.

Medical technologies guidance, diagnostics guidance and interventional procedures guidance

The recommendations in this interactive flowchart represent the view of NICE, arrived at after careful consideration of the evidence available. When exercising their judgement, healthcare professionals are expected to take these recommendations fully into account. However, the interactive flowchart does not override the individual responsibility of healthcare professionals to make decisions appropriate to the circumstances of the individual patient, in consultation with the patient and/or guardian or carer.

Commissioners and/or providers have a responsibility to implement the recommendations, in their local context, in light of their duties to have due regard to the need to eliminate unlawful discrimination, advance equality of opportunity, and foster good relations. Nothing in this interactive flowchart should be interpreted in a way that would be inconsistent with compliance with those duties.

Commissioners and providers have a responsibility to promote an environmentally sustainable health and care system and should assess and reduce the environmental impact of implementing NICE recommendations wherever possible.