



Key Messages for Antimicrobial Stewardship in Community Settings

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Respiratory infections (RTI)

- Antibiotic guideline
- Upper respiratory tract infections
- Strive for 5

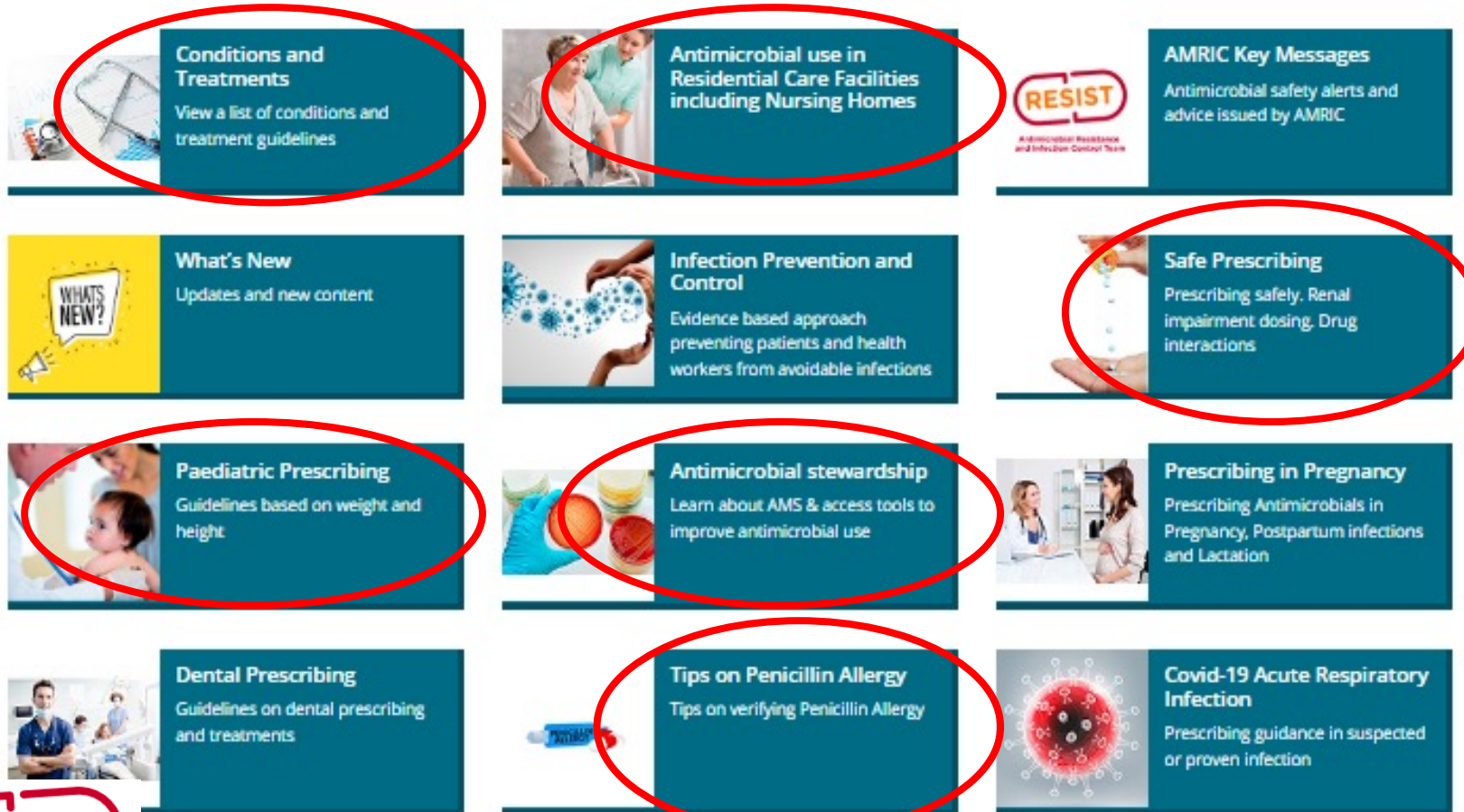
Urinary tract infections (UTI)

- Prophylaxis reviews
- Skip the Dip for UTI in over 65s
- UTI resistance rates Ireland



National Antimicrobial Prescribing Guidelines for Community Settings

www.antibioticprescribing.ie



Most widely used
clinical resource
amongst GPs

Over 80 Clinical
Guidelines

Multi-disciplinary
involvement
with >60 experts,
including community
pharmacists

Reviews led by the
Community Antimicrobial
Pharmacists

RESIST



Key Messages for Antimicrobial Stewardship in Community Settings

Respiratory Tract Infections

Guideline Updates
Upper respiratory tract infections
Strive for 5



Acute Cough / Bronchitis - Sept 2024

- The antibiotic treatment table has been removed to reflect international best practice. Acute cough / bronchitis is caused mainly by viruses and is a self-limiting condition. In the majority of cases, antibiotics are not indicated.

Sinusitis - Sept 2024

- Addition of dosing table for intranasal steroids to be considered for people with symptoms of around 10 days or more. Note added regarding duration of treatment for severe / worsening infection.

Pneumonia in Residential Care Facilities - Sept 2024

- Updates to guidance on aspiration pneumonia. Some antibiotic dose amendments.

*Co-amoxiclav suspensions available for those with swallowing difficulties:

Co-amoxiclav Solid Dose Form	Suspension Available as	Measured dose
500mg/125mg Tablet	Augmentin® Paediatric Oral Suspension (125 mg/31.25 mg per 5 mL) OR Co-amoxiclav paediatric (125 mg/31.25 mg per 5 mL)	20mL = 500mg/125mg
875mg/125mg Tablet	Augmentin® Duo Oral Suspension (400 mg/57 mg per 5 mL)	11 mL = 880mg/125mg (off label use)



BUGS & DRUGS

Q: Is an antibiotic usually beneficial for any of the following illnesses?

	Yes/No
Middle ear infection	
Sore throat	
Common cold	
Sinusitis	
Acute cough / bronchitis	



ANSWER: NO

Antibiotics generally not required for these self-limiting illnesses

Many respiratory tract infections are viral infections and antibiotics won't work.

For common upper respiratory tract infections:

- Antibiotics are often not needed
- They may do more harm than good
- Limited impact on time to symptom resolution

Informing patients how long they can expect symptoms to resolve without antibiotics can help to manage their expectations

Middle ear infection	3-7 days
Sore throat	7 days
Common cold	14 days
Sinusitis	14-21 days
Acute cough / bronchitis	21 days

Refer patients to <https://www2.hse.ie/conditions/common-illnesses/> for advice on self management of common illnesses.



For more information, consult the Respiratory section on www.antibioticprescribing.ie





BUGS & DRUGS

**Q: IF an antibiotic is required,
what is the recommended antibiotic treatment duration for the
following infections in primary care**

	Treatment duration
Sinusitis	
Otitis media	
Community acquired pneumonia	
Infective exacerbation of COPD	



ANSWER: 'STRIVE FOR FIVE'
**5 days for all respiratory tract infections that
 require antibiotics***

- A 7 day antibiotic course for respiratory tract infections (RTIs) is no longer recommended in primary care.
- Strong evidence to support shorter courses.
- Shorter courses are more likely to improve adherence.
- Every extra day of antibiotic increases likelihood of adverse effects and antimicrobial resistance.

*If scarlet fever suspected, a 10 day course of antibiotic is recommended.

In severe sinusitis, in select cases, 7-10 day antibiotic course may be considered.

Remember: Many RTIs are viral or self limiting and don't require an antibiotic.

For more information, consult Respiratory sections on antibioticprescribing.ie



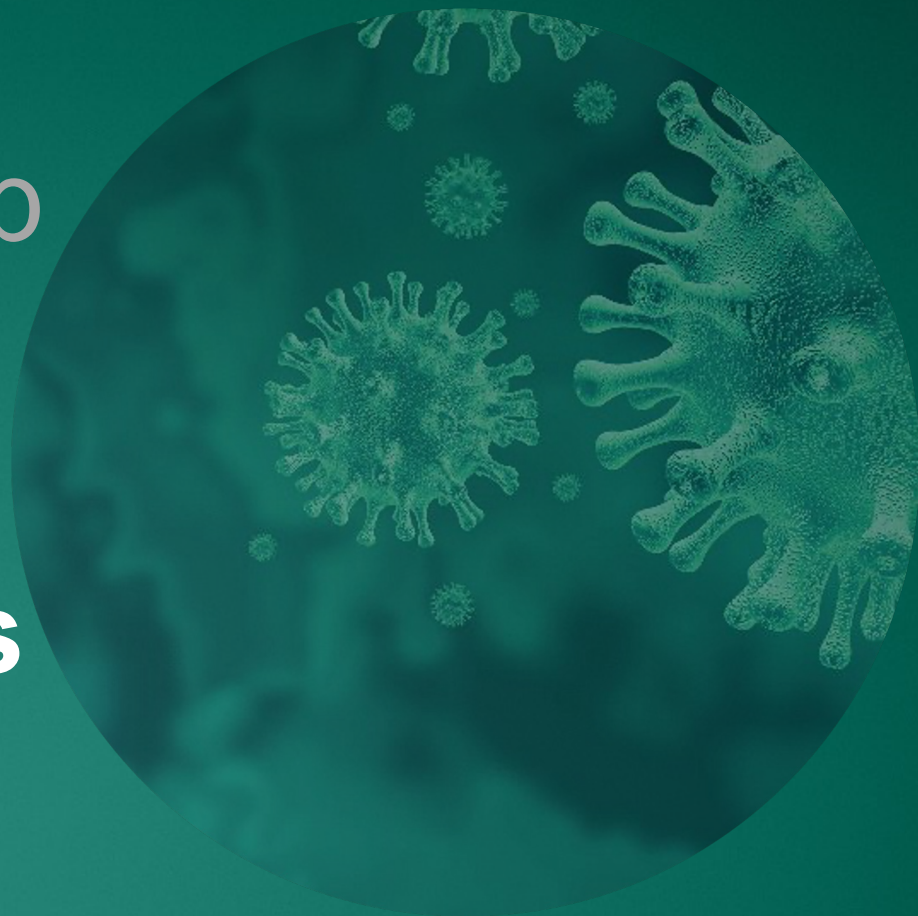
Key Messages for Antimicrobial Stewardship in Community Settings

Urinary Tract Infections

Prophylaxis

Skip the Dip

Resistance patterns



QUIZ

BUGS & DRUGS

Q: For a patient on long-term UTI prophylaxis, how long should prophylaxis be continued?

- A. 1 month
- B. 3-6mths
- C. 1 year
- D. 3-5yrs
- E. Lifelong



ANSWER:



For a patient on long-term UTI prophylaxis, how long should prophylaxis be continued?

A. 1 month

B. 3-6mths

C. 1 year

D. 3-5yrs

E. Lifelong

- All UTI prophylaxis should be reviewed at 3-6 months with a view to stopping.
- Long term use is associated with antimicrobial resistance and increased risk of adverse drug reactions such as pulmonary fibrosis and peripheral neuropathy associated with nitrofurantoin.
- Pharmacists should prompt review of antibiotic prophylaxis with prescriber

Visit the Urinary Section of www.antibioticprescribing.ie for De-prescribing UTI prophylaxis guidance





BUGS & DRUGS

Q: For whom is dipstick urinalysis recommended to assess for urinary tract infection (UTI)?

A	Adults 65 years and older
B	Adults with indwelling catheters
C	Pregnant women
D	Men
E	Children



ANSWER: ONLY E

Dipstick urinalysis recommended when assessing for UTI in children



- Older persons and adults with indwelling catheters are likely to have asymptomatic bacteriuria (bacteria in urine without causing harm). A positive nitrite / leukocyte result does not always indicate a urine infection and may lead to unnecessary use of antibiotics.
- For suspected UTIs, dipstick urinalysis is no longer recommended for:
 - ❖ Adults 65 years and over
 - ❖ Adults with indwelling catheters
 - ❖ Men
 - ❖ Pregnant women



A urine sample for culture should be sent if UTI suspected for above.

A diagnosis of UTI should be made on clinical signs and symptoms.

For more information, consult Urinary section on antibioticprescribing.ie

View the [Position Statements Dipstick Urinalysis for UTI in Adults](#)





Skip the Dip for UTI in over 65s

- Performing dipstick urinalysis is an ingrained practice amongst medical and nursing staff
- Aim: to promote best practice in assessment of UTI and reduce inappropriate antibiotic prescribing for UTI in HSE older persons residential care facilities (RCFs) (>100 RCFs)
- Method: Focus groups held to identify facilitators and barriers. Surveys conducted to assess dipstick urinalysis practice. Antibiotic use for UTI monitored monthly. Skip the Dip campaign resources developed. Antimicrobial Pharmacists conducted workshops for RCF staff. National webinar recording available.
- Results: Reduction in number of RCFs reporting using dipstick urinalysis for UTI assessment (98% RCFS reported using dipsticks in 2020/21, reduced to 24% by March 2024)
- Trend in reduction of antibiotics prescribed for UTI



National Quality
Improvement Initiative
led by HSE Community
Antimicrobial
Pharmacists

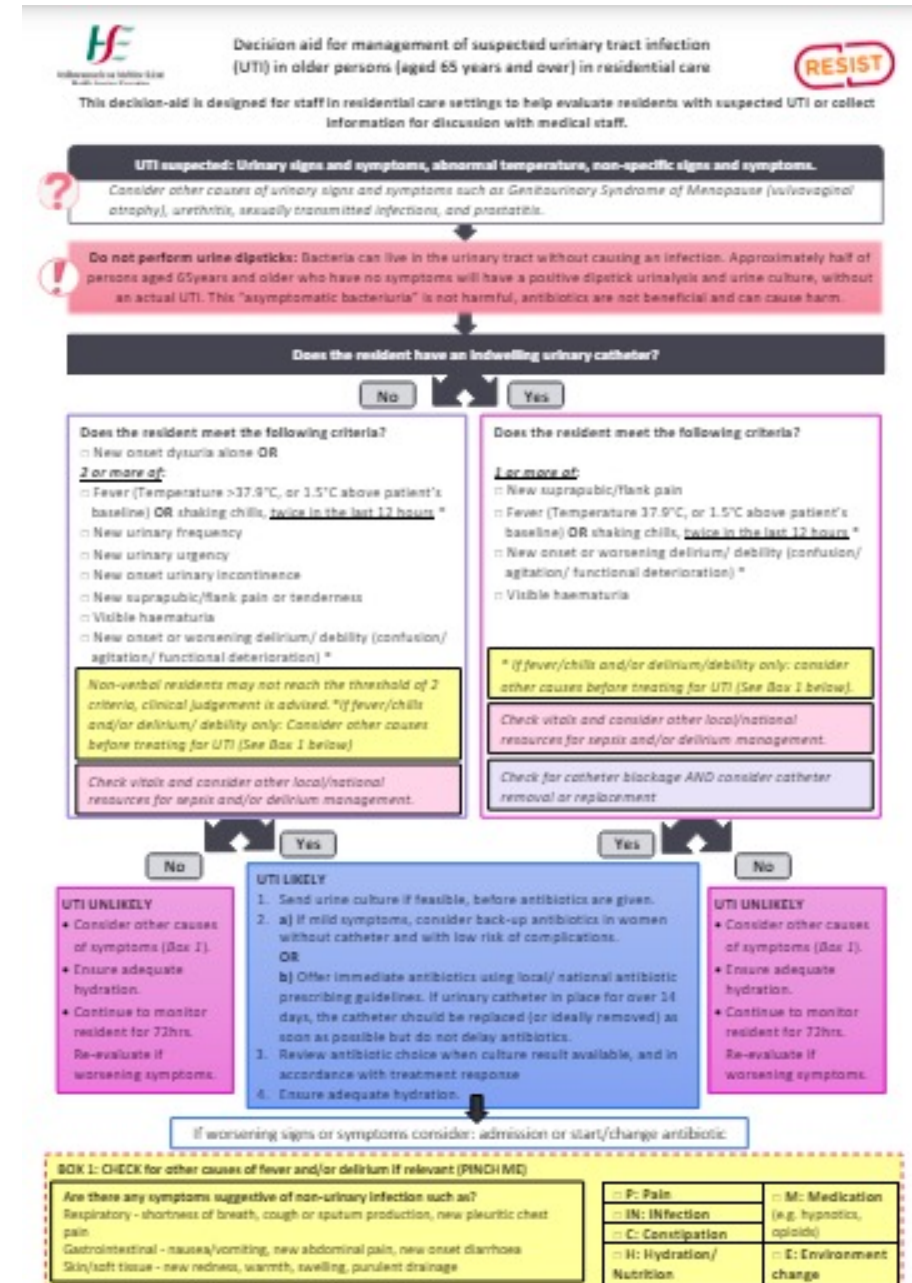
**In persons >65 years,
urine dipsticks are
likely to be positive if
there are bacteria in
urine, whether they
are causing an
infection or not.**



Decision aid for management of suspected UTI

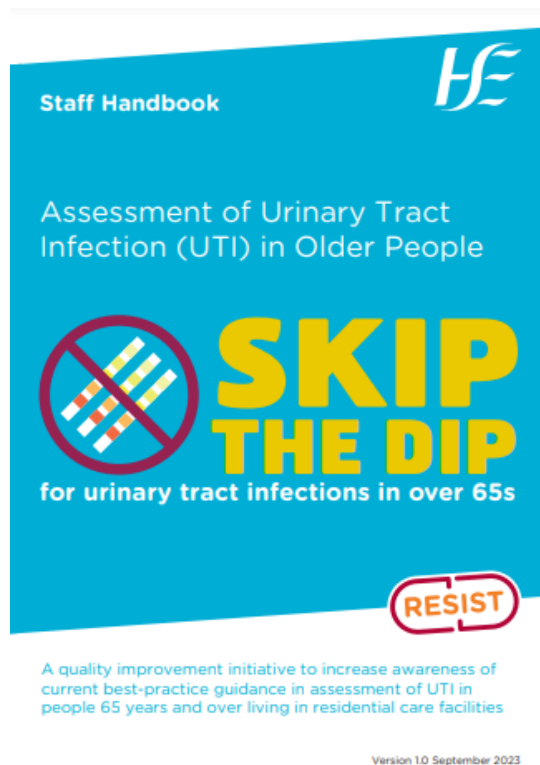
Guides staff in residential care facilities on how to manage suspected UTI without performing dipstick urinalysis

<https://www.hse.ie/eng/services/list/2/gp/antibiotic-prescribing/prescribing-ltcf/decision-aid-for-management-of-suspected-uti-in-older-persons-over-65yrs-in-residential-care.pdf>

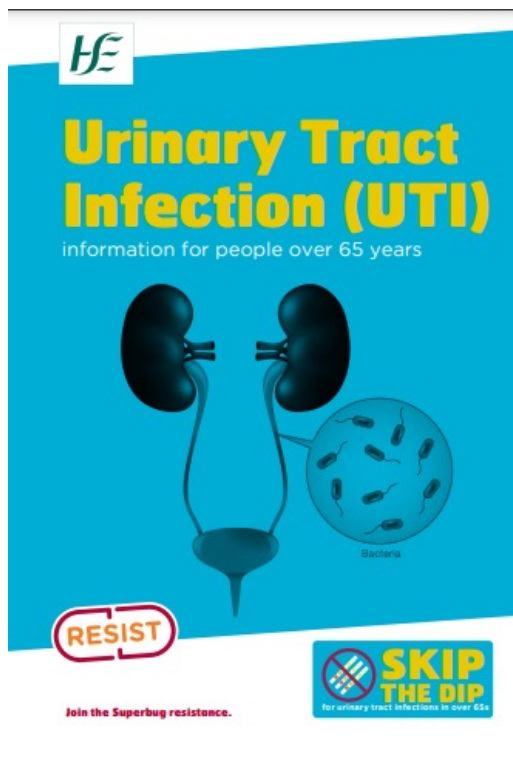




SKIP THE DIP for UTI in Over 65s



RCF staff handbook



Resident / patient leaflet

Information, resources and webinar recording on the Skip the Dip Quality Improvement Initiative in HSE nursing homes is available on [Antibiotics in Nursing Home section](https://www.antibioticprescribing.ie/Antibiotics%20in%20Nursing%20Home%20section) of www.antibioticprescribing.ie



Community Antimicrobial Pharmacists



Skip the Dip QI has won 2 poster prizes at national conferences





UTI antibiotic resistance patterns



- No routine surveillance of UTI culture and antibiotic susceptibility (MC&S) in community settings
- In general, for *E. Coli* UTI:
 - Amoxicillin resistance rates very high
 - Trimethoprim and co-amoxiclav resistance moderately high
 - Nitrofurantoin resistance low
 - Ciprofloxacin: multiple warnings with adverse effects with fluoroquinolones. Use as last resort for targeted therapy.




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Antibiotic Good Practice Points






Good Practice Points for Antibiotics Poster

**Good Practice Points for Antibiotics (Adults)**
Key Learnings from the National Antimicrobial Point Prevalence Survey 2020/21





Doxycycline (Scan here to view Red/Green antibiotics) 

- ▶ **Green (preferred) antibiotic** suitable for many respiratory tract infections
- ▶ Take with a glass of water and sit upright for 30 minutes
- ▶ If gastritis is an issue, give with food or milk
- ▶ Risk of photosensitivity. Advise use of sunscreen/sunblock
- ▶ Separate administration of doxycycline from antacids, iron/calcium/magnesium/zinc-containing products (e.g. CalciChew®, Galfer®) by at least 3 hours or treatment failure may occur
- ▶ DO NOT OPEN CAPSULES. For swallowing difficulties, doxycycline dispersible tablets are available (unlicensed) and may be approved for reimbursement under the hardship scheme.

Nitrofurantoin

- ▶ **Green (preferred) antibiotic** suitable for many lower urinary tract infections
- ▶ Check preparation:

• 100 mg every 12 hours use MacroBID® (prolonged release) capsules	
OR	
• 50 - 100 mg every 6 hours use MacroDANTIN® (normal release) capsules	

- ▶ Not recommended for complicated upper UTIs
- ▶ Caution in renal impairment. Contraindicated if eGFR < 30 mL/min/1.73 m²
- ▶ Max recommended duration 6 months for UTI prophylaxis
- ▶ Can take with food to prevent nausea


Co-amoxiclav

- ▶ **'Red' (Reserved) antibiotic:** is there a first line Green antibiotic alternative? e.g.
 - RTI: amoxicillin or doxycycline
 - UTI: nitrofurantoin or cefalexin
- ▶ See www.antibioticprescribing.ie for the recommended options for specific infections
- ▶ Avoid in penicillin allergy
- ▶ If liquid preparation required, remember:

Liquid co-amoxiclav product	625 mg (500/125mg) dose
<input checked="" type="checkbox"/> Augmentin® Paediatric Oral Suspension (125 mg/31.25 mg per 5 mL)	20 mL
<input checked="" type="checkbox"/> Co-amoxiclav paediatric (125 mg/31.25 mg per 5 mL)	20 mL
<input checked="" type="checkbox"/> Augmentin® Duo Oral Suspension (400 mg/57 mg per 5 mL)	Not recommended, as unable to measure

Clarithromycin

- ▶ **'Red' (Reserved) antibiotic:** is there a first line Green antibiotic alternative? e.g.
 - RTI: amoxicillin or doxycycline
- ▶ Several significant **drug interactions** (statins/ warfarin/ other anticoagulants/ antidepressants/ antipsychotics and other QT prolongers and many more)
- ▶ Avoid in patients with history of QT prolongation or arrhythmia

(Scan here to view drug interactions) 

Good Practice Points for Antibiotics (Adults). Community Antimicrobial Pharmacists Group. www.antibioticprescribing.ie April 2024 Version 2.0

Available in the Toolkit for Antimicrobial Stewardship in Residential Care Facilities on www.antibioticprescribing.ie
<https://www.hse.ie/eng/services/list/2/gp/antibiotic-prescribing/prescribing-ltcf/good-practice-points-v2-0-final-april-2024.pdf>