

Clinical Decision Support Tools Lunch and Learn



Clinical decision support tools

- Clinical Decision Support (CDS) tools are designed to support health professionals to recognise potential cancer signs and symptoms and manage patients appropriately.
- CDS tools do not replace clinical judgement.
 - Provide further guidance to inform patient management decisions.
 - This may be to refer, to safety net, or it may support the decision on which pathway is most appropriate.



Primary Care Toolkit

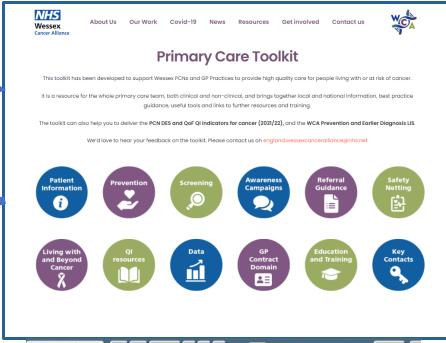


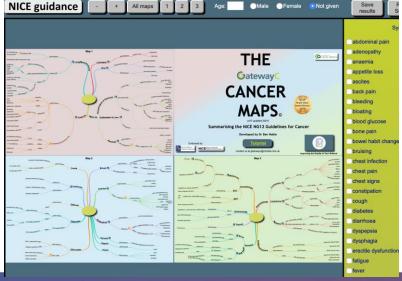
Clinical Decision Support (CDS) Tools

CDS tools are designed to support health professionals to recognise potential cancer signs and symptoms and manage patients appropriately. Many are based on algorithms and calculate a patient's risk of cancer.

- Ardens NG12 Symptoms and Findings Analyser Available in SystmOne and EMIS Web
- QCancer Available via the website and in EMIS Web.
- Macmillan Cancer Decision Support Tool Available in EMIS Web and INPS Vision
- C the Signs Available as an app, via a website and on GP systems (£)

A more detailed overview of the different CDS tools and review of evidence has been carried out by CRUK.







Background



Clinical Decision Support Tools

Local use

- According to a survey conducted by WCA in 2021* only a quarter of clinicians in Wessex use clinical decision support tools. *(Wessex Cancer Alliance, unpublished, 2021)
- The reason for staff not using CDS tools was identified in the majority of responses (49%) to be related to them not being aware of the tools
- Other reasons for CDS tools not being used included, lack of training, lack of time, forgetting to use the tool and preference to use own clinical judgement.
- Similar findings in recent Dorset survey



2022 Cancer Early Detection LIS

Requirement

- Clinical lead to join webinar on use of CDSTs
- Trial use of these in the PCN
- Share reflections

Responses from 50 PCNs received

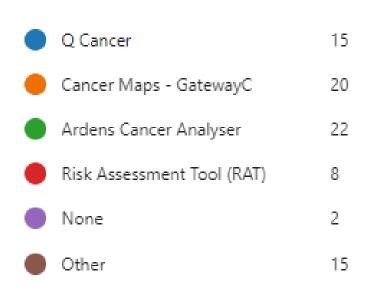


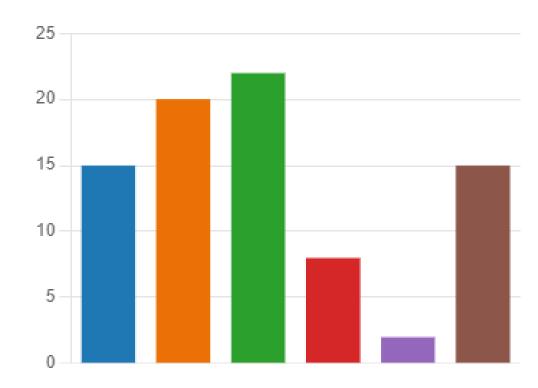
Findings











'Other' includes;

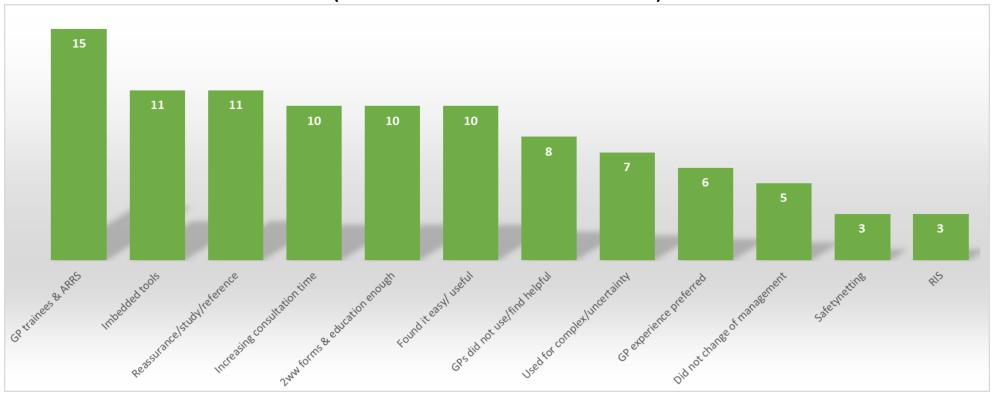
ERICA trial, BMJ infographic, CRUK Infographic, NICE Desk Easel & many opted to trial several tools







Themes based on the number of PCNs that cited each theme (all tools combined)









Ardens Symptom Analyser (quotes from reporting)

- Imbedded in Ardens, which is a platform commonly used by all
- Additional consultation time
- Good for GP trainees
- ARDENS clear and often referred to, but feels a bit "tick boxy" during consultation
- By using the template, it has helped formulate clinical decisions and reinforced decisions they had already made
- CDTs can get lost in the EMIS qof box, especially if there are a number of other indicators when patients have multiple long term conditions

Example - Pt's are identified in a timely manner using Ardens safety netting. The symptoms and Diagnostic trackers are monitored weekly by the cancer care coordinator who checks if investigations have been completed, if follow up appointments need to be booked, or a patients needs a phone call to see if there symptoms persist. This gives the GP reassurance that these patients are monitored and not slipping through the net. Although at first the trackers were a hard sell to the GP's as they added another step to the consultation process we have cases when it is clear that the benefits of using this safety netting tool







Gateway Cancer Maps (Quotes from reporting)

- Are available on SystemOne and can be helpful aid to reflection as to when tests are required and which tests
- The cancer maps were felt to be useful in patients with more non-specific symptoms as they helped to build up a picture of a possible diagnosis and so these were preferred to the Ardens one
- More aware of them now so might use when have a difficult case that a clinician is worried about and does not meet referral criteria for chosen cancer area.
- One PCN survey Of those surveyed who had trialled one or both of the tools, 67% found Cancer Gateway C maps alone helpful for their clinical decision making
- Another PCN Survey 5 responses to survey, showing that the tool is helpful and easy to use.
- NICE guidance is easily depicted on the clinical cancer maps for key symptoms/signs
- The cancer maps were visually very complicated and not easy to navigate as they contain so much information.

Examples:

- I found GatewayC Cancer Maps quick to access via a tab saved on the Bookmarks bar on Chrome browser
- The cancer maps, provided by GatewayC, are built in to the Ardens templates within our clinical system which makes them easy to access. They are helping our clinicians with referrals and safety-netting







RAT (quotes from reporting)

• These guidelines are very easy to use. Clinicians use these tools when there is uncertainty. Patients presenting with vague symptoms are especially difficult and the RATs can give some guidance. Junior staff find them especially useful. At times a low cancer risk from the symptoms given may give some reassurance providing effective safety netting is given. I think we will continue to use these tools. We will continue to teach our trainee doctors about them too.

Example:

RATS were found to be a useful tool when presentation is with limited symptoms or signs i.e. one or two symptoms/signs. We were able to print and produce handheld RATS visual guides which allowed the RATS to be quickly and easily reviewed during a consultation. RATS are straightforward to use and allows quick visual guide to help clinicians risk assess a symptom presentation for chance of cancer, and aid management decisions for when to refer as a suspected cancer, or when to investigate and safety net. RATS have been particularly useful with the less experienced clinicians. Since trialling this within the PCN we do feel that awareness of cancer presentations and NG12 referral criteria has improved







QCancer (quotes from reporting)

- Q Cancer risk is a great tool and very useful, although does require opening a new window which can increase admin time.
- The ANP staff found it more interesting and useful
- Qcancer helpful to see % relative risk of individual cancers to then guide further questioning/investigation
- Q Cancer is always running but is not particularly helpful
- The q risk calculator was felt to be clunky. And a lot of the symptoms would so obviously trigger a 2ww referral that if you had considered looking at the Qcancer tool you should already have done a 2ww referral
- Clunky to use, not beneficial and wouldn't necessarily change their management.
- Easy to use as automated when using EMIS
- Risk of scoring fatigue and not noticing score
- This tool being part of EmisWeb makes it easy to access and use.

NOTE: EMIS practices Qcancer is integrated, SystemOne it is not, which explains some variation in response

• **Example:** PCN to explore with IT teams the role of retrospective searches that utilise Qcancer symptoms to produce search output data of risk of various cancers.







Update on QScores (EMIS)

- Removal of integrated QScores in EMIS Web
- Qscores are based and validated using Read codes, whilst EMIS and the NHS now use SNOMED-CT.
 This creates clinical and regulatory risk, including a small risk to patients of an inaccurate risk score as more SNOMED-CT codes are released by NHS Digital
- From April 2023, integrated QScore calculations will no longer be available in EMIS Web
- Historic score calculations will still be visible in the Care Record.







CRUK desk easel

- We have included the NG12 desktop interactive CDST for clinicians to refer to regarding red flag s/s based on systems. Unclear impact on clinician specific clinical decision making but useful reference resource now exists within clinician resources to guide decision making.
- The NICE CRUK symptom easel received positive comments ease of use, clarity, useful to refer to during or after consultation.

CRUK Infographic

 Has a very niche role for when have 'gut feeling' but cant place what it is but often the tools are a bit unwieldy and don't really get there









- How can they help?
- When to use them?
- Who is best to use them?
- What do you do with the results?







- How can they help? Clinicians miss cancers for 2 main reasons- not thinking about cancer and not fully investigating the symptoms. CDS tools can help with this
- When could they be used? In complex patients where the clinician is not sure what's going on, patients with persistent symptoms or frequent attendances, where there is clinical suspicion but symptoms are vague and there is uncertainty about what to do







- Who can use them? Any clinician- the LIS results suggest that less experienced clinicians find these tools most useful. These are not just tools for doctors many other clinicians will be in contact with patients who may have a cancer
- What do you do with the results? The results can help focus investigations. More than one tool can be used on the same patient. Remember the NICE 2ww threshold for referral is 3%. Remember the Rapid Investigation Service



Demo/Case studies

Case Scenario

- Mrs Smith aged 64 contacts the practice to say that she has dysuria, urinary frequency and mild abdominal discomfort for the past few days. She would like you to prescribe another course of antibiotics please. This is her third contact with the surgery in the past 4 months with similar symptoms. She has previously been treated with antibiotics on the previous 2 occasions for UTI
- What would you do?

This suite of QCancer® tools has been developed for the UK population, and is intended for use in the UK.

The QCancer® scores

Today's QCancer® score

First published in 2013, this score works differently to tumour site specific scores, as it gives a risk of undiagnosed cancer for the individual across a whole range of tumour sites. It is, therefore, a patient centred score, rather than a tumour site centred score.

It works out the risk of a patient having a current but as yet undiagnosed cancer taking account of their risk factors and current symptoms. It does not give a diagnosis of cancer, but a risk of having one as yet undiagnosed.

The science underpinning the QCancer[®] score was published in January 2013 edition of the BJGP. The algorithms are updated and recalibrated anually, and this site implements the 2017 update.

There are two calculators, one for men and one for women:

- QCancer for men
- QCancer for women

Some useful documents describing this tool:

- A presentation giving a good overview of QCancer: QCancer-Overview-Dec-2012.pdf
- How best to use the calculators: <u>Using-QCancer-in-a-clinical-setting.pdf</u>

QCancer® implemented in EMIS Web

We are delighted that QCancer[®] has been fully integrated into EMIS Web. We have worked closely with EMIS and Macmillan Cancer Support on their implementation.

If you are an EMIS customer, you can find further information on their implementation of QCancer within EMIS Web at the EMIS Support centre:

• https://supportcentre.emishealth.com/news/emis-web-library/using-the-qcancer-decision-support-tool/

About

WEICOME to the Yeaheer -2010 115K calculator for women.

http://qcancer.org/female

Reset	For men	Information	Publication	
Calculate risk				
About you—				
Age (25-89):		64		
UK postcod	le: leave blanl	k if unknown		
Postcode: (
Clinical inform	nation———			
Smoking statu	s: non-smoker	\$		
Alcohol status	: non-drinker	\$		
Do you have	e ———			
a family history of gastrointestinal cancer?				
a family his	tory of breast	cancer?		
a family his	tory of ovaria	n cancer?		
type 2 diabe	etes?			
chronic obs	tructive airwa	ys disease (COP	D)? 🗌	
endometrial	hyperplasia o	or polyp?		
chronic pan	creatitis?			
Do you curr	ently have			
loss of appe	tite?			
unintentiona	al weight loss	? 🔾		

Your risk of having one of the following cancers, as yet undiagnosed is:

Contact Us

Algorithm

Software

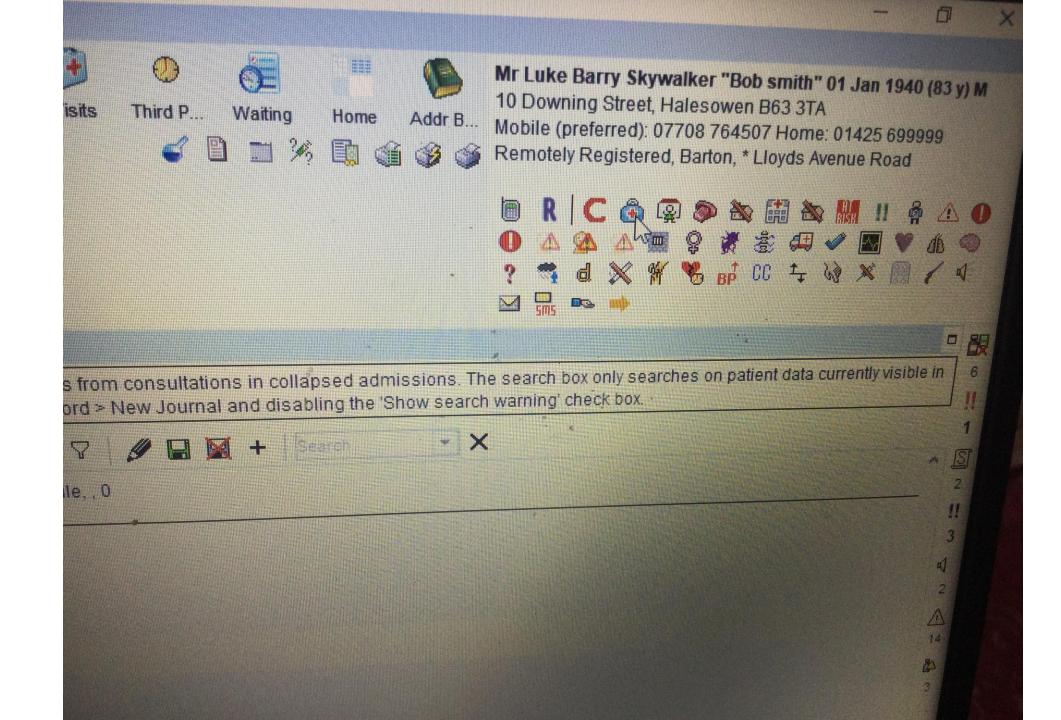
Copyright

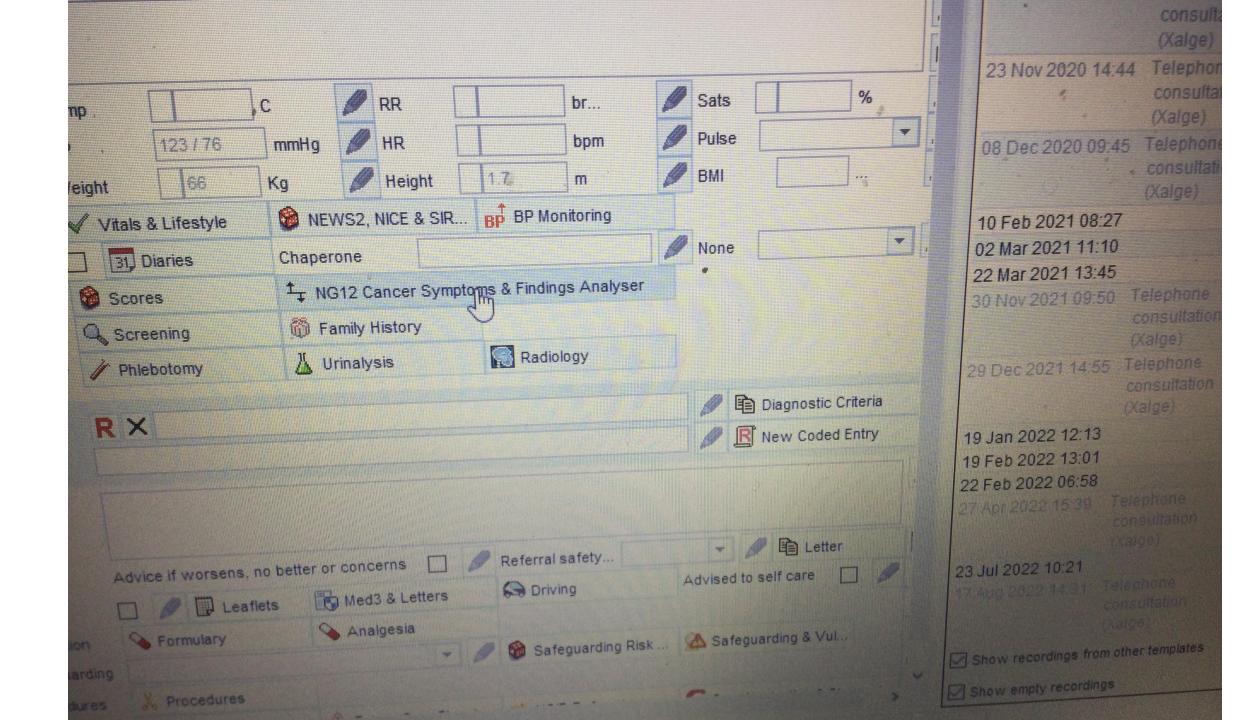
Cancer	Type	Risk
No cancer		97.2%
Any cancer		2.8%
	colorectal	0.6%
	other	0.52%
	ovarian	0.5%
	breast	0.43%
	pancreatic	0.23%
	blood	0.18%
	gastro-oesophageal	0.1%
	uterine	0.08%
	renal tract	0.07%
	lung	0.06%
	cervical	0.04%

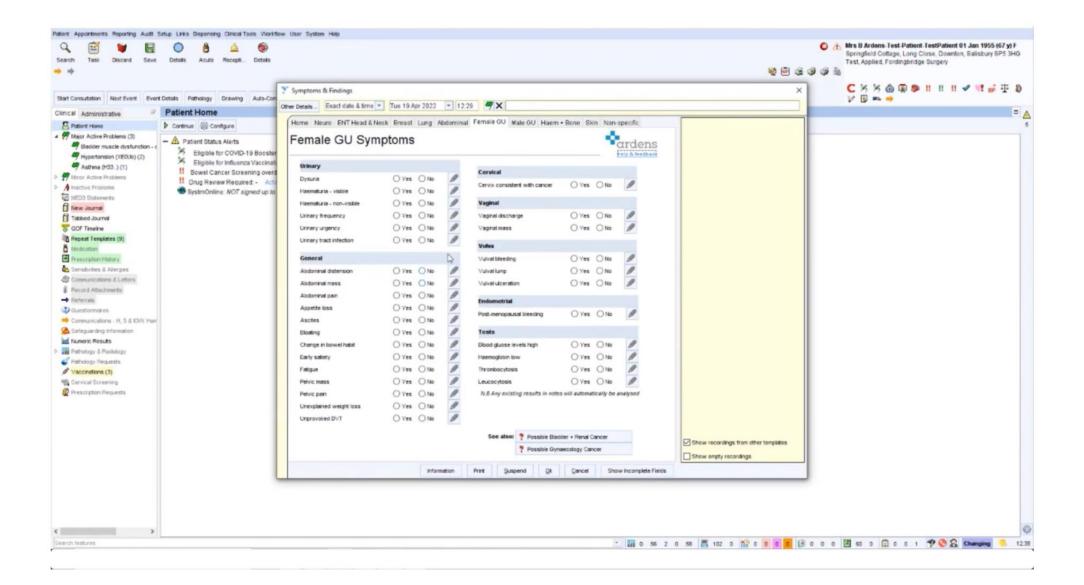
You have a 2.8% risk of having a cancer as yet undiagnosed, and correspondingly, a 97.2% chance that you are clear.

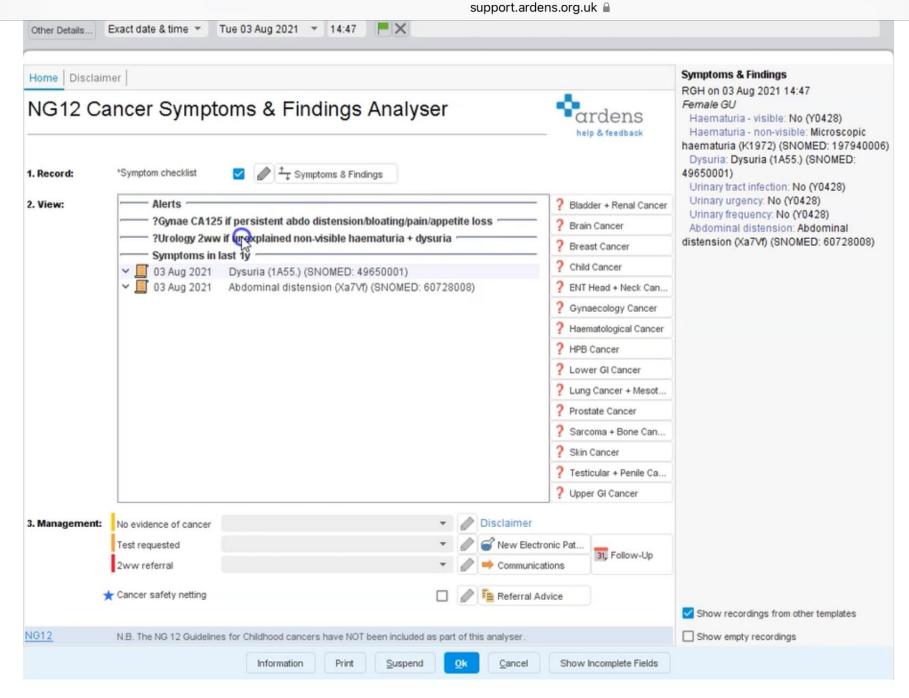
In other words, in a crowd of 100 people with the same risk factors as you, 3 are likely to have a cancer as yet undiagnosed and 97 will not, as shown by the chart below.

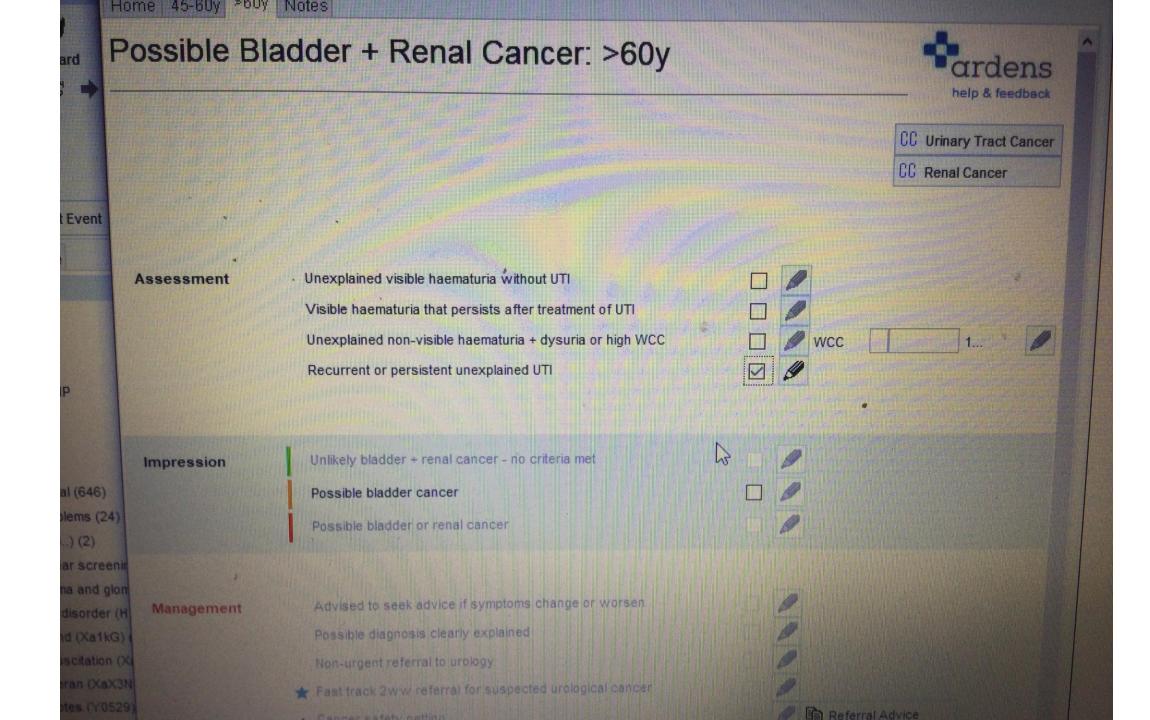








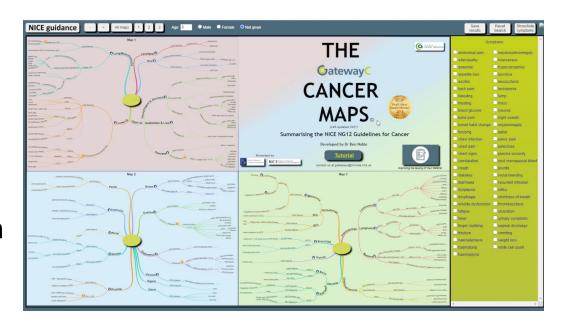






GatewayC Cancer Maps

- "Cancer Maps" are found on the GatewayC website/NG12 resources page/CRUK CDS Tool overview page/Ardens Cancer Analyser
- No login required (login is required to access the GatewayC courses – use practice "J" number/ask WCA)
- Helps clinicians identify possible cancers by illustrating the NG12 recommendations in an interactive way
- Introductory tutorial on the Cancer Maps homepage.





Link to Cancer Maps in Ardens Cancer Analyser

Analyser Resources Disclaimer

Resources



Cancer Maps

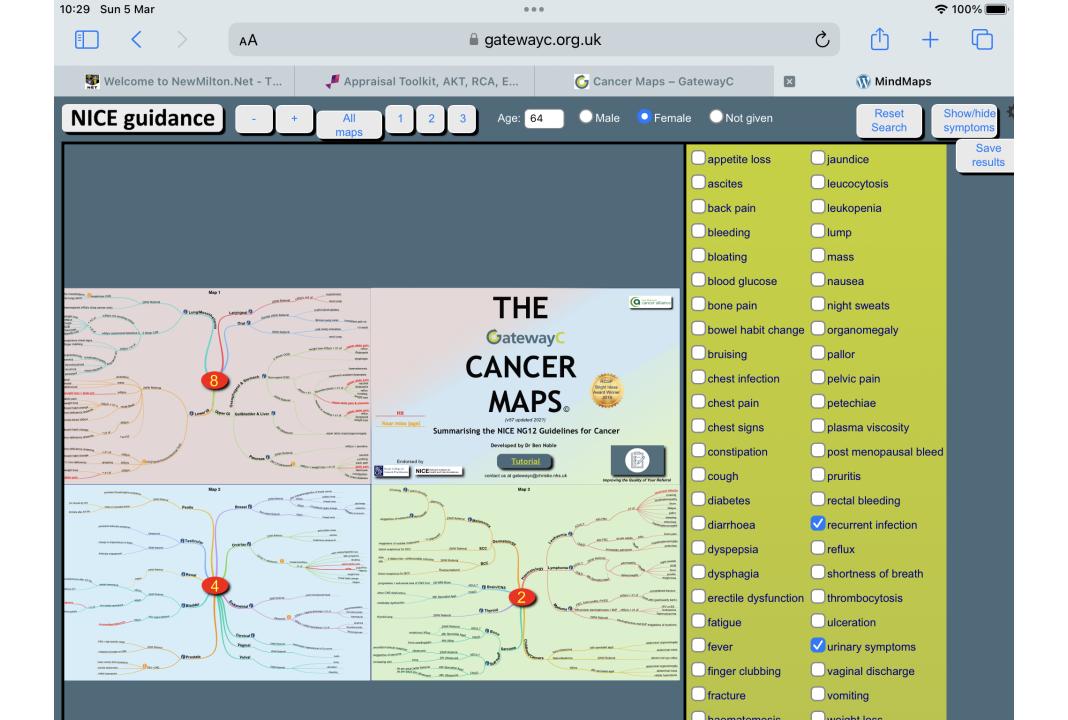
NICE NG12

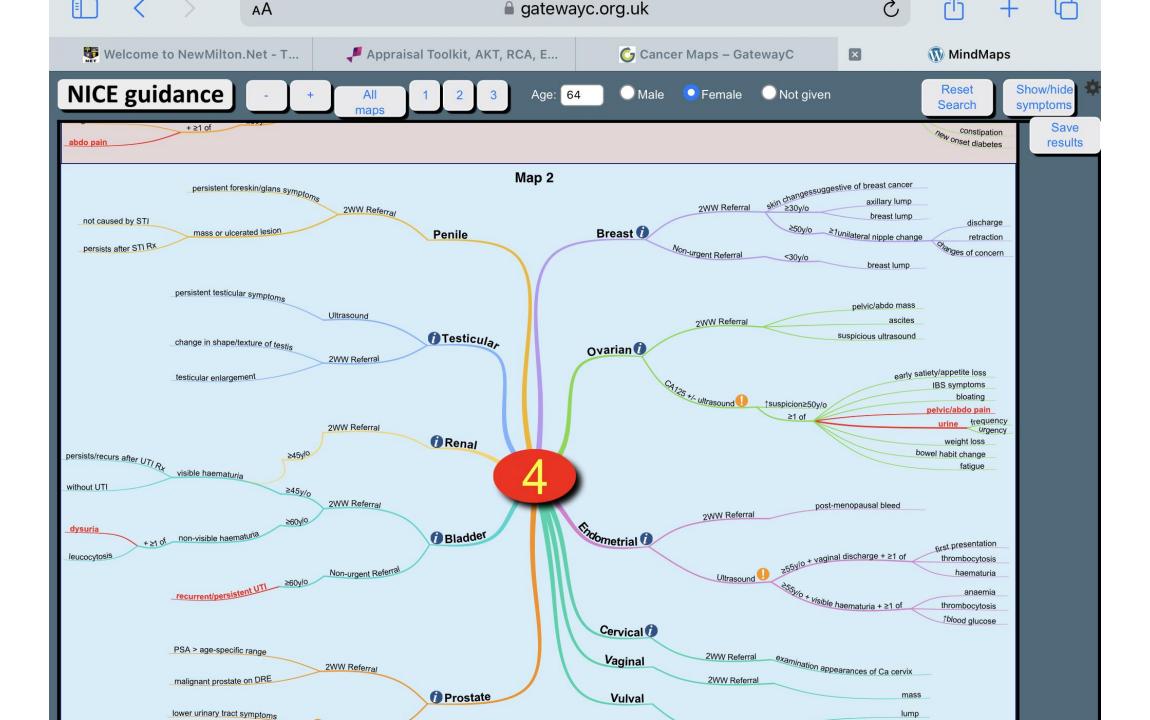
https://www.gatewayc.org.uk/cancer-maps/

https://www.nice.org.uk/guidance/ng12/



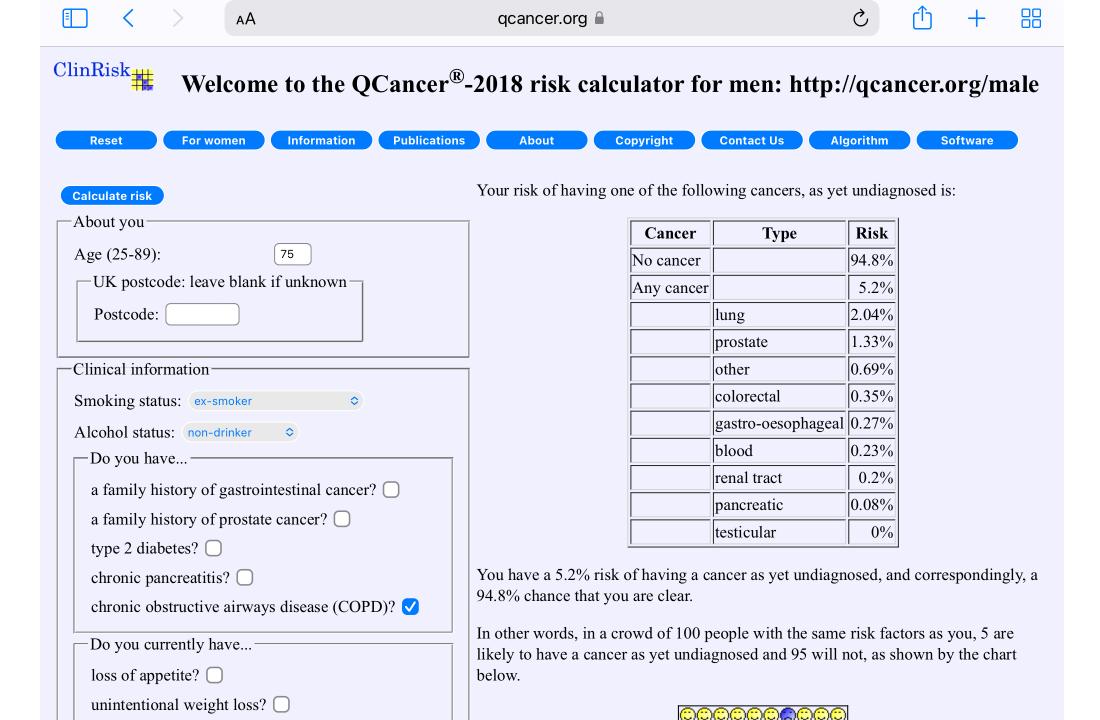
To send message, highlight above > Copy with Ctrl+C > Click Send Message > Paste with Ctrl + V



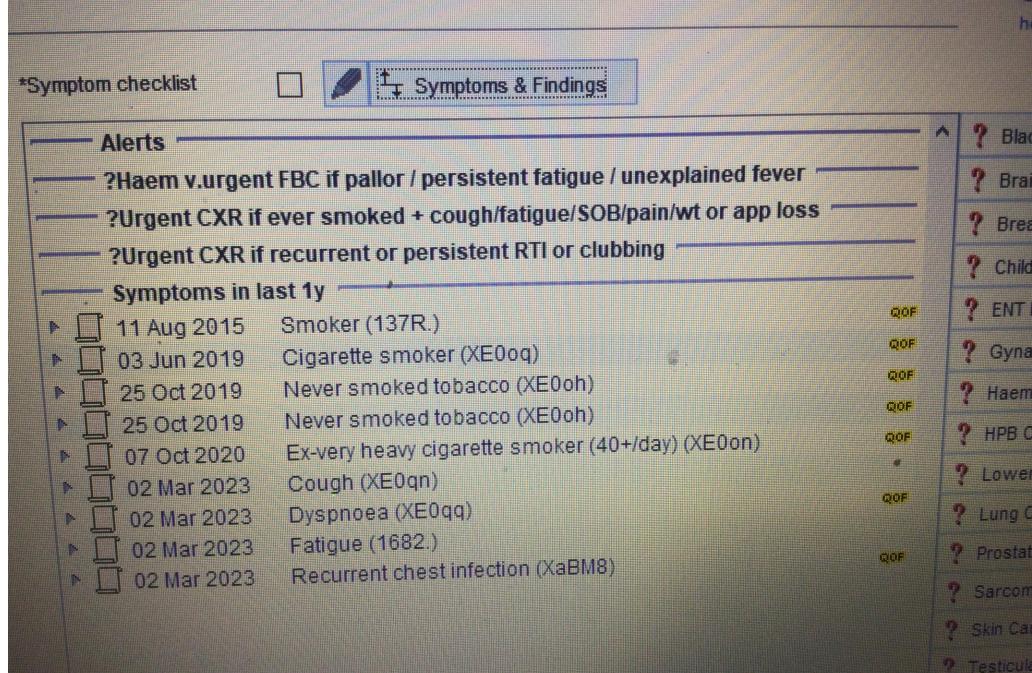


Case Scenario

- Mr Brown aged 75 attends for his annual COPD review. He's an exsmoker. You can see that over the past year he's been treated for 3 exacerbations- the last one was about a month ago. He usually gets an average of one exacerbation a year. You ask him how he is and he says he's still got a bit of a cough and is a little more short of breath and feels tired
- Should you be concerned?



12 Cancer Symptoms & Findings Analyser





Home

View All Symptoms

About

Welcome to Pulse Reference

Pulse Reference is the new product from Pulse designed to help GPs make sense of patient presentations. Based on the best-selling book Symptom Sorter, it is written and designed by GPs and gives a symptom-based approach to clinical problem solving. The resource covers the vast majority of symptoms seen in primary care. Each symptom is organised into common, occasional or rare differentials, with distinguishing features, and symptom management is prompted through suggestions for investigations, top tips and red flags.

This was launched in September 2022, and we will continuously keep all content up to date.

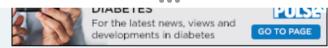
Search by symptom...

Search symptom...

Q

Simply enter the symptom, keyword or illness to search our symptoms database.





Top Tips

- Explain to patients that it is not unusual for the cough of a simple URTI to go on for 3 weeks this will reduce unnecessary reattendances.
- Take a careful history of provoking factors in the case of persistent cough this is more likely to reveal the diagnosis than is chest auscultation.
- Have a low threshold for arranging a CXR in the middle-aged and elderly smoker with a cough.
- ACE inhibitor-associated cough may come on many months or even longer after initiating treatment. It starts to improve within
 1–4 weeks of stopping treatment but may take 3 months to settle completely.
- In a persistent cough with a normal CXR and no chest signs, think asthma, GORD and rhinitis a therapeutic trial for each may be needed to clinch the diagnosis.

Red Flags

- Remember to ask about foreign travel. Atypical pneumonias are infrequent, and TB rare, but both can still present.
- Beware of persistent cough, weight loss and voice change in a smoker arrange an X-ray to exclude malignancy.
- Night sweats with persistent cough suggest significant pathology such as TB or malignancy.
- Beware the patient on immunosuppressants these drugs may alter the clinical picture, predispose to serious complications and in some cases (e.g. methotrexate) may be the cause of the cough itself.

Summary

- Clinical Decision Support Tools don't replace clinical judgment.
- They can help to assess the risk of Cancer (Q Cancer)
- They can help to ensure that all potential investigations are considered
- Most of the tools require the clinician to consider Cancer
- Cancer is increasing- 50% of us will have cancer in our lifetime
- The Tools can be particularly helpful in patients with nonspecific symptoms or who are repeatedly attending with the same symptoms
- Remember the Rapid Investigation Service