Northumbria Healthcare
NHS Foundation Trust

AHSN Lipids and FH
How to achieve QOF lipid targets
Lipid optimisation workshop

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QOF targets 2023/24: Cholesterol

QOF target	Points value	QOF Threshold target	NENC current average (CVD prevent)
CHOL001 on 2ry prevention register plus CKD, prescribed or declined a statin	14	70-95%	84%
CHOL002 on 2ry prevention register with nonHDLc <2.5	16	20-35%	30%

Summary of National Guidance for Lipid Management for Primary and Secondary Prevention of CVD

ACCELERATED ACCESS COLLABORATIVE

NHS

INITIAL CONSIDERATIONS:

● Measure non-fasting **full lipid profile** (Total cholesterol, HDL-C, non-HDL-C, triglycerides) and HbA1c as part of an initial baseline assessment. ● Consider secondary causes of hyperlipidaemia and manage as needed. ● Ensure appropriate baseline and follow up tests as detailed on page 2. Measure BMI. ● Identify and exclude people with contraindications/drug interactions ● If non-fasting triglyceride above 4.5mmol/L see page 2.

PRIMARY PREVENTION

Consider statin therapy for adults who do not have established CVD but fall into the categories below. Use QRISK risk assessment tool where appropriate (see page 2, 'Primary Prevention Risk Assessment')

- Age ≤84 & QRISK ≥10% over next 10 years
- Type 2 diabetes & QRISK ≥10% over next 10 years
- Type 1 diabetes, if they have one or more of the following:
  - Over 40 years
  - Had diabetes for >10 years
  - Have established nephropathy
  - Have other CVD risk factors
- CKD eGFR < 60 mL/min/1.73m2 and/or albuminuria
- Age ≥85 years if appropriate consider comorbidities, frailty & life expectancy

Identify and address all modifiable risk factors - smoking, diet, obesity, alcohol intake, physical activity, blood pressure and HbA1c.

Consider additional risk factors, if present, together with QRISK score (treated for HIV, severe mental illness, taking medicines that cause dyslipidaemia, systemic inflammatory disorder (e.g. SLE), impaired fasting glycaemia, recent change in risk factors).

PRIMARY PREVENTION

If lifestyle modification is ineffective or inappropriate offer statin treatment.

Atorvastatin 20mg OD

- Measure full lipid profile again after 3 months (non-fasting).
- High intensity statin treatment should achieve reduction of non-HDL-C > 40% from baseline. If not achieved after 3 months;
- Discuss treatment adherence, timing of dose, diet and lifestyle
- If at higher risk (based on comorbidities, risk score or clinical judgement – see page 2 'Additional Risk Factors') consider increasing the dose every 2-3 months up to a maximum dose of atorvastatin 80mg daily.
- For how to increase in people with CKD see 'Special Patient Populations' (page 2)

- If patients on a high-intensity statin have side effects, offer a lower dose or an alternative statin (see page 2 'Extent of lipid lowering with available therapies')
- If maximum tolerated dose of statin does not achieve non-HDL-C reduction > 40% of baseline value after 3 months consider adding Ezetimibe 10mg daily (NICE TA385)
- If recommended statin therapy is contraindicated or not tolerated;
- Ezetimibe monotherapy may be considered. Assess response after 3 months
  - See local statin intolerance guidance / pathway where available
  - Ezetimibe 10mg/bempedoic acid 180 mg combination may be considered when ezetimibe alone does not control non-HDL-C/LDL-C well enough (NICE TA694).

If non-HDL-C reduction remains < 40% of baseline despite maximal tolerated lipid lowering therapy (including people with intolerances and contraindications) consider referral to specialist lipid management clinic according to local arrangements.

SEVERE HYPERLIPIDAEMIA

If TC>7.5mmol/L and/or LDL-C >4.9mmol/L and/or non-HDL-C >5.9mmol/L, a personal and/or family history of confirmed CHD (<60 years) and no secondary causes: suspect Familial Hypercholesterolaemia (Possible Heterozygous FH)
Do not use QRISK risk assessment tool

DIAGNOSIS AND REFERRAL

Take fasting blood for repeat lipid profile to measure LDL-C.
Use the Simon Broome or Dutch Lipid Clinic Network (DLCN) criteria to make a clinical diagnosis of FH.
Refer to Lipid Clinic for further assessment if clinical diagnosis of FH
or if TC>9.0mmol/L and/or
LDL-C >6.5mmol/L and/or
non-HDL-C >7.5mmol/L or
Fasting triglycerides > 10mmol/L
(regardless of family history) (page 2)

TREATMENT TARGETS IN FH

If clinical diagnosis of FH and/or other risk factors present, follow the recommended treatment management pathway for primary or secondary prevention as for non-FH, BUT
Aim to achieve at least a 50% reduction of LDL-C (or non-fasting non-HDL-C) from baseline.
Consider specialist referral for further treatment and/or consideration of PCSK9i therapy IF
- they are assessed to be at very high risk of a coronary event**
- OR therapy is not tolerated
- OR LDL-C remains >5mmol/L (primary prevention)
- OR LDL-C remains >3.5mmol/L (secondary prevention)

Despite maximal tolerated statin and Ezetimibe therapy.
**defined as any of the following:
- Established coronary heart disease.
- Two or more other CVD risk factors

SECONDARY PREVENTION

Offer statin therapy to adults with CVD, this includes angina, previous MI, revascularisation, stroke or TIA or symptomatic peripheral arterial disease. Do not delay statin treatment if a person has acute coronary syndrome. Take a lipid sample on admission (within 24 hours)

Identify and address all modifiable risk factors - smoking, diet, obesity, alcohol intake, physical activity, blood pressure and HbA1c.

SECONDARY PREVENTION

Do not delay statin treatment in secondary prevention while managing modifiable risk factors. Prescibe a high intensity statin: Atorvastatin 80mg OD. Use a lower dose of Atorvastatin if there is a potential drug interaction, high risk of or experiencing adverse effects, or patient preference. Offer Atorvastatin 20mg if CKD (people with GFR< 60 mL/min/1.73m2).

- Measure full lipid profile again after 3 months (non-fasting).
- High intensity statin treatment should achieve reduction of non-HDL-C > 40% from baseline. If not achieved after 3 months
- Discuss treatment adherence, timing of dose, diet and lifestyle measures
- If started on less than atorvastatin 80mg and the person is judged to be at higher risk (based on comorbidities, risk score or clinical judgement – see page 2 'Additional Risk Factors'), consider increasing to 80mg Atorvastatin. For how to increase in people with CKD see 'Special Patient Populations' (page 2).
- If non-HDL-C baseline value is not available*, consider target non-HDL-C < 2.5mmol/L (approximately equivalent to LDL-C < 1.8mmol/L) as recommended by Joint British Societies (JBS3).

*This scenario is not covered by NICE CG181

- If patients on a high-intensity statin have side effects, offer a lower dose or an alternative statin (see page 2 "Extent of lipid lowering with available therapies')

If maximum tolerated dose of statin does not control non-HDL-C/LDL-C well enough after 3 months confirm statin adherence, then consider the following options based on shared decision making* with the patient

If recommended statin treatment is contraindicated or not tolerated – follow AAC Statin Intolerance Algorithm for advice regarding adverse effects (click here).

If statin intolerance is confirmed, consider:
- **Ezetimibe 10mg** monotherapy. Assess response after 3 months (TA385)
- **Ezetimibe 10mg/bempedoic acid 180 mg** combination when ezetimibe alone does not control non-HDL-C sufficiently. (NICE TA694)

If non HDL-C remains > 2.5mmol/L despite other lipid lowering therapies consider Injectable therapies – arrange a fasting blood test and assess eligibility criteria (TA393/394, TA733)

Ezetimibe 10mg daily (NICE TA385). Reassess after three months. If non-HDL-C remains > 2.5mmol/L; consider **injectable therapies** arrange a fasting blood test and assess eligibility

* See overleaf for information to support shared decision making
** Inclisiran and PCSK9i should not be prescribed concurrently

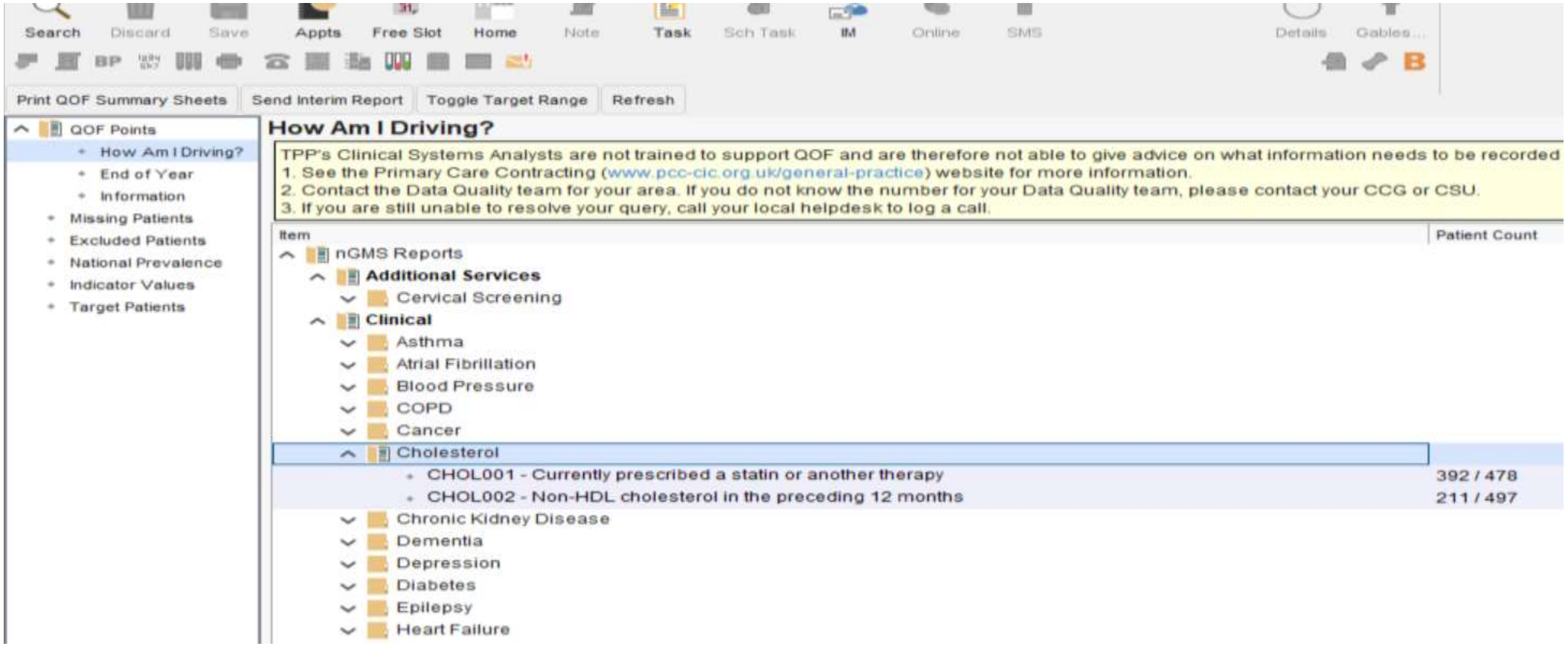
Injectable therapies**
If non-HDL-C > 2.5mmol/L; Arrange fasting blood test to measure LDL-C to assess eligibility:
- **Inclisiran -** if fasting LDL-C ≥ 2.6mmol/L despite maximum tolerated lipid lowering therapy (TA733)

OR
- **PCSK9i** - see overleaf for LDL-C thresholds. (TA393/4) If eligibility criteria are not met, consider **ezetimibe 10mg daily** (if not previously considered)

QOF searches- How am I driving?

PCN 50,000
Denominator approx. 3500

Practice 6000
Denominator approx. 500



Primary care: Digital searches

UCLPartners

ardens
HEALTHCARE INFORMATICS

Name	Population Count	%
FH Case Finding - Combined (DLCNS >=5 Adj OR NICE Plus Adj)	54	1%
FH Case Finding: 0. DLCNS Possible FH >=5 TG Adj OR >8 #	32	1%
FH Case Finding: 1. DLCNS Definite FH >6 TG Adj #	4	1%
FH Case Finding: 1. DLCNS Definite FH >8 TG Adj #	1	1%
FH Case Finding: 1. DLCNS Definite FH>8 #	1	1%
FH Case Finding: 2. DLCNS Probable FH 6-8 #	27	1%
FH Case Finding: 2. DLCNS Probable FH 6-8 TG Adj #	16	1%
FH Case Finding: 3. DLCNS Possible FH 5 #	33	1%
FH Case Finding: 3. DLCNS Possible FH 5 TG Adj #	15	1%
FH Case Finding: 4. DLCNS Possible FH 3-4 #	437	4%
FH Case Finding: 5. DLCNS Possible FH 3-5 #	470	4%
FH Case Finding: NICE Total Plus	109	1%
FH Case Finding: NICE Total Plus (taking TGs into consideration)	46	1%
FH Case Finding: Simon Broome 1 - Definite FH #	0	0%
FH Case Finding: Simon Broome 2 - Possible FH #	40	1%

Clinical Digital Resource Collaborative

CDRC Supporting Clinical Decisions

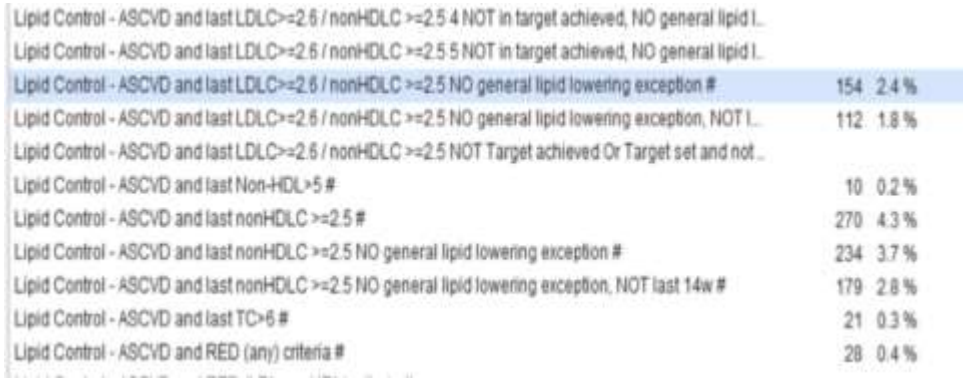
Join our Journey

North East and North Cumbria

CDRC searches

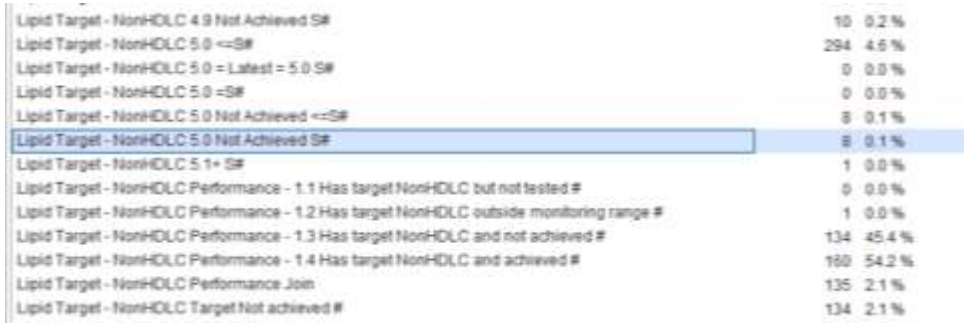
www.cdrc.nhs.uk

- Can help to prioritise a large list
- Prioritise by highest nonHDLc



Lipid Control - ASCVD and last LDLC>=2.6 / nonHDLC >=2.5 4 NOT in target achieved, NO general lipid l..		
Lipid Control - ASCVD and last LDLC>=2.6 / nonHDLC >=2.5 5 NOT in target achieved, NO general lipid l..		
Lipid Control - ASCVD and last LDLC>=2.6 / nonHDLC >=2.5 NO general lipid lowering exception #	154	2.4 %
Lipid Control - ASCVD and last LDLC>=2.6 / nonHDLC >=2.5 NO general lipid lowering exception, NOT l..	112	1.8 %
Lipid Control - ASCVD and last LDLC>=2.6 / nonHDLC >=2.5 NOT Target achieved Or Target set and not ..		
Lipid Control - ASCVD and last Non-HDL>5 #	10	0.2 %
Lipid Control - ASCVD and last nonHDLC >=2.5 #	270	4.3 %
Lipid Control - ASCVD and last nonHDLC >=2.5 NO general lipid lowering exception #	234	3.7 %
Lipid Control - ASCVD and last nonHDLC >=2.5 NO general lipid lowering exception, NOT last 14w #	179	2.8 %
Lipid Control - ASCVD and last TC>6 #	21	0.3 %
Lipid Control - ASCVD and RED (any) criteria #	28	0.4 %

- Titrating statins
- Re-trying statins
- Adding ezetimibe



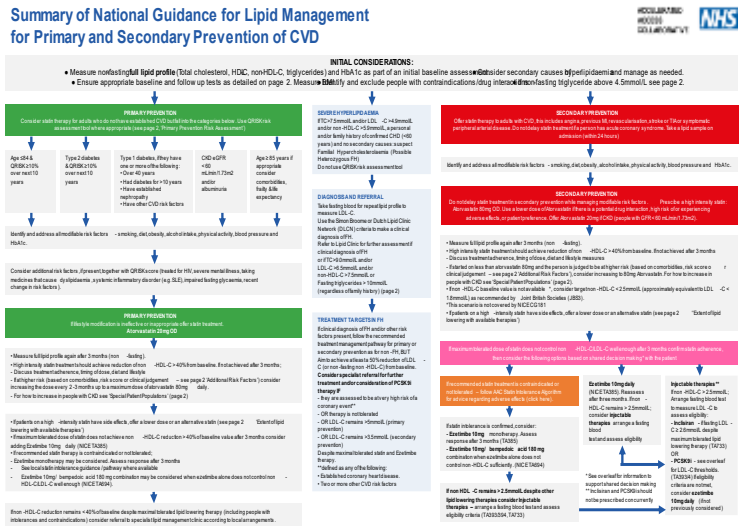
Lipid Target - NonHDLC 4.9 Not Achieved S#	10	0.2 %
Lipid Target - NonHDLC 5.0 <=S#	294	4.6 %
Lipid Target - NonHDLC 5.0 = Latest = 5.0 S#	0	0.0 %
Lipid Target - NonHDLC 5.0 =S#	0	0.0 %
Lipid Target - NonHDLC 5.0 Not Achieved <=S#	8	0.1 %
Lipid Target - NonHDLC 5.0 Not Achieved S#	8	0.1 %
Lipid Target - NonHDLC 5.1+ S#	1	0.0 %
Lipid Target - NonHDLC Performance - 1.1 Has target NonHDLC but not tested #	0	0.0 %
Lipid Target - NonHDLC Performance - 1.2 Has target NonHDLC outside monitoring range #	1	0.0 %
Lipid Target - NonHDLC Performance - 1.3 Has target NonHDLC and not achieved #	134	45.4 %
Lipid Target - NonHDLC Performance - 1.4 Has target NonHDLC and achieved #	160	54.2 %
Lipid Target - NonHDLC Performance Join	135	2.1 %
Lipid Target - NonHDLC Target Not achieved #	134	2.1 %

- Consider injectables- fasting blood sample to get LDLc

Lipid targets

- Primary or secondary prevention?

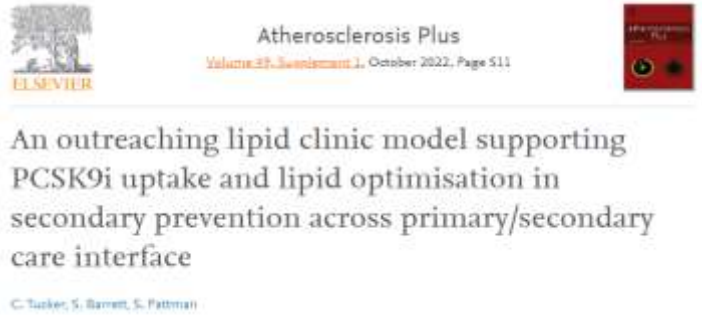
- Document a cholesterol target
  - Primary prevention
    - NICE (2014) : 40% reduction in non-HDL cholesterol
  - Secondary prevention
    - JBS-3 (2013): Non-HDL-c < 2.5mmol/L

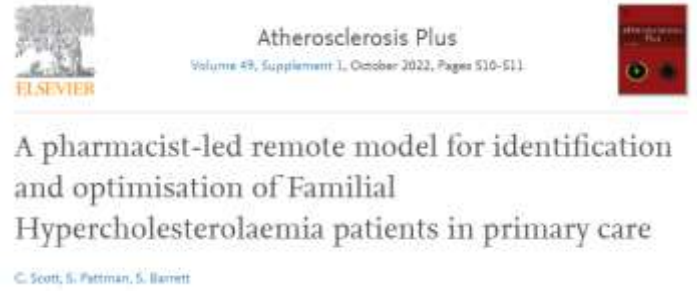


Shared decision making- statin declined!

- Explaining risk and benefits: *primary/ secondary prevention*
- Consultation skills

  -lots of different health beliefs out there!
- Resources: NHS England website/ CPPE





FACTS

Statins do work- reduce cholesterol by 40%

Statins reduce risk of MI or Stroke by 23% (1)

If side effects: Alternative statin/ re-try statin (2)

Diet/ lifestyle modifications reduce cholesterol by 10% if maintained- sometimes this is not enough!

1.Cholesterol Treatment Trialists Collaboration, Baigent C, Blackwell L, Emberson J, Holland LE, Reith C, Bhala N, Peto R, Barnes EH, Keech A, Simes J, Collins R. Efficacy and safety of more intensive lowering of LDL cholesterol: a metaanalysis of data from 170,000 participants in 26 randomised trials. Lancet 2010;376:16701681
2. N-of-1 Trial of a Statin, Placebo, or No Treatment to Assess Side Effects N Engl J Med 2020; 383:2182-2184 DOI: 10.1056/NEJMc2031173

Group 1

- Lipid optimisation
- Assessing for Familial Hypercholesterolaemia
- High triglycerides

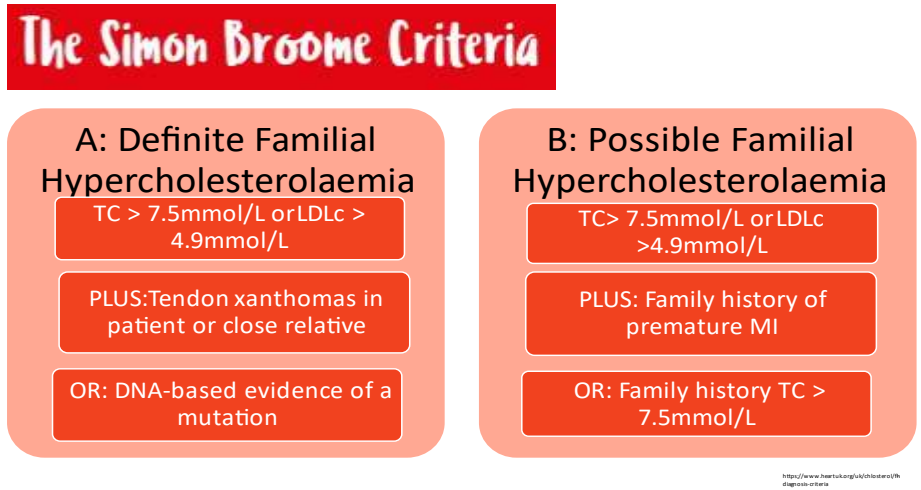
Assess for Familial Hypercholesterolaemia (FH) and treatment

Sarah 50 years

- Blood Pressure (BP) 155/85 mmHg
- Body Mass Index (BMI) 30kg/m^2
- Smoker
- Father Myocardial Infarction (MI) aged 52
- 2 brothers: MI 54y/ CABG 49y
- 2 sisters: 1x TC 7.6, 1x nil of note
- Prescribed Atorvastatin 80mg daily

- Do you refer to lipid clinic or not?
- What questions do you ask about atorvastatin?

Total cholesterol mmol/L	9.7
Triglycerides mmol/L	1.8
HDLc mmol/L	1.9
Non HDLc mmol/L	7.8



Sarah 50y - ?FH/ optimise lipids

- Total cholesterol >7.5mmol/L

  ? FH -refer to NEELI (Simon Broome criteria)
- No Personal History of premature CVD (currently 50y)
- Family History premature CVD

  document fully
- Ask patient how they feel about atorvastatin/ side effects

  statin re-trial / trial rosuvastatin first, then if positive for FH offer PCSK9i
- Request a fasting lipid - LDL
- Refer to lipid clinic for further assessment

Assess for FH and treatment

John 65 years

- Myocardial Infarction (MI) aged 55
- Blood Pressure (BP) 125/80 mmHg
- Body Mass Index 24kg/m^2
- Smoker
- Active /Healthy diet
- Mother MI aged 50
- Muscle aches and pains with:
  - simvastatin/ atorvastatin/ rosuvastatin / ezetimibe

Total cholesterolmmol/L	8.5
Triglycerides mmol/L	1.8
HDLc mmol/L	1.9
Non HDLc mmol/L	6.6

- Do you refer to lipid clinic or not?
- What treatment options do you discuss?

John 65 years- ?FH / optimise lipids

- Total cholesterol >7.5mmol/L

  ? FH -refer to NEELI (Simon Broome criteria)*

- Personal History of premature CVD
- Family History premature CVD

  document fully

- Ask patient how they feel about

  statin re-trial then offer PCSK9i injections

- Request a fasting lipid- LDL
- Refer to lipid clinic for further assessment

Assess for FH and treatment

Jim 67 years

- BP 145/ 85 mmHg
- BMI 30 Non Smoker
- Alcohol 20 units per week
- HbA1c 62
- QRISK 18%

Total cholesterol mmol/L	7.1
Triglycerides mmol/L	1.1
HDLc mmol/L	1.3
Non HDLc mmol/L	5.8

Does Jim require primary or secondary prevention?

What is the cholesterol target?

What interventions will reduce cholesterol?

Jim 67 years

- Primary prevention – no CVD event
- QRISK 18%- start a statin
- Cholesterol target – 40% reduction in nonHDLc from peak
- Reduce cholesterol with lifestyle modifications, in addition to statin:
  - Reduce alcohol intake
  - Discuss diet: reduce sugar intake- reducing HbA1c will reduce cholesterol
  - Consider increasing exercise
  - Can try diet first but statin reduces risk ore quickly and effectively- need to ensure patient understands the risk/ benefit of the options

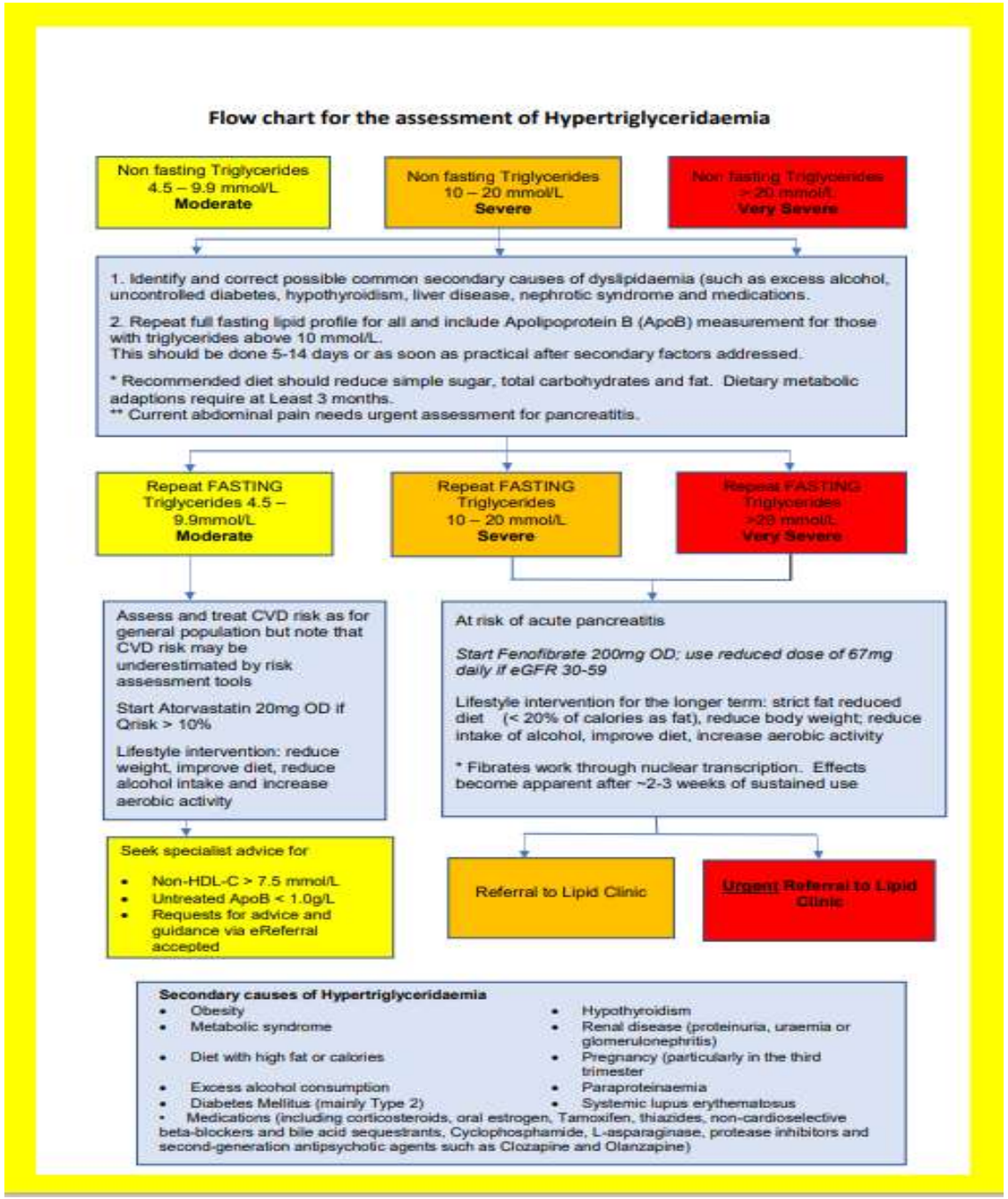
High Triglycerides

NEELI guideline (NEELI ntag)

You request a lipid blood test and the triglycerides are above 4.5 mmol/L.

What do you do?

Total cholesterol mmol/L	6.5
Triglycerides mmol/L	15
HDLc mmol/L	xx
Non HDLc mmol/L	xx



Group 2

- Lipid optimisation pathway
- Assessing for Injectable therapies

Lipid optimisation

James 63y

- MI 53y
- Smoker
- BMI 32
- Prescribed atorvastatin 80mg daily

Is primary or secondary prevention required?

What is the cholesterol target?

What treatment options would you recommend?

What else would you discuss?

Total cholesterol mmol/L	7.3
Triglycerides mmol/L	2.4
HDLc mmol/L	1.1
Non HDLc mmol/L	6.2

Telephone call to discuss adding ezetimibe

- James has stopped Atorvastatin as experiencing muscle aches and pains in both legs.

- What do you suggest?

a)Lower dose statin

b)Rosuvastatin

c)Ezetimibe alone

6 months later

- Prescribed rosuvastatin 20mg daily and ezetimibe 10mg daily
- Target nonHDLc <2.5mmol/L

- You request a fasting lipid blood sample

What options would you discuss?

a) Medication Adherence

b) Discuss lifestyle factors

c) PCSK9i / Inclisiran injections

Total cholesterol mmol/L	6.8
Triglycerides mmol/L	2.4
HDLc mmol/L	1.1
Non HDLc mmol/L	5.7
LDLc mmol/L (fasting sample)	4.5

James tells you he hasn't been taking the rosuvastatin and prefers to re-try rather than have an injection.

12 months later

- Stopped rosuvastatin
- Severe muscle aches in both legs,
- Still taking ezetimibe 10mg OD

What treatments do you discuss?

a) Nothing

b) Inclisiran (LDL> 2.6mmol/L)

c) PCSK9i (LDL> 4 mmol/L)

Total cholesterol mmol/L	6.3
Triglycerides mmol/L	2.4
HDLc mmol/L	1.1
Non HDLc mmol/L	5.2
LDLc mmol/L (fasting sample)	4.1

Assess lipid lowering options

Sally aged 68y

- MI 62y
- Tried simvastatin/ atorvastatin/ rosuvastatin- severe muscle aches and pains
- Tried ezetimibe – gastric upset: bloated/ diarrhoea

Total cholesterol mmol/L	5.4
Triglycerides mmol/L	1.9
HDLc mmol/L	1.1
Non HDLc mmol/L	4.3

Does Sally require primary or secondary prevention?

What is the cholesterol target?

What treatment options do you discuss?

What bloods do you request?

Assess lipid lowering options

Sally MI aged 68y

- Secondary prevention
- Intolerance to multiple statins
- LDLc >2.6mmol/L
- Intolerant to ezetimibe so not for bempedoic acid as per NICE TA694

What treatment options do you discuss?

Total cholesterol mmol/L	5.4
Triglycerides mmol/L	1.9
HDLc mmol/L	1.1
Non HDLc mmol/L	4.3
LDLc mmol/L (fasting sample)	3.3

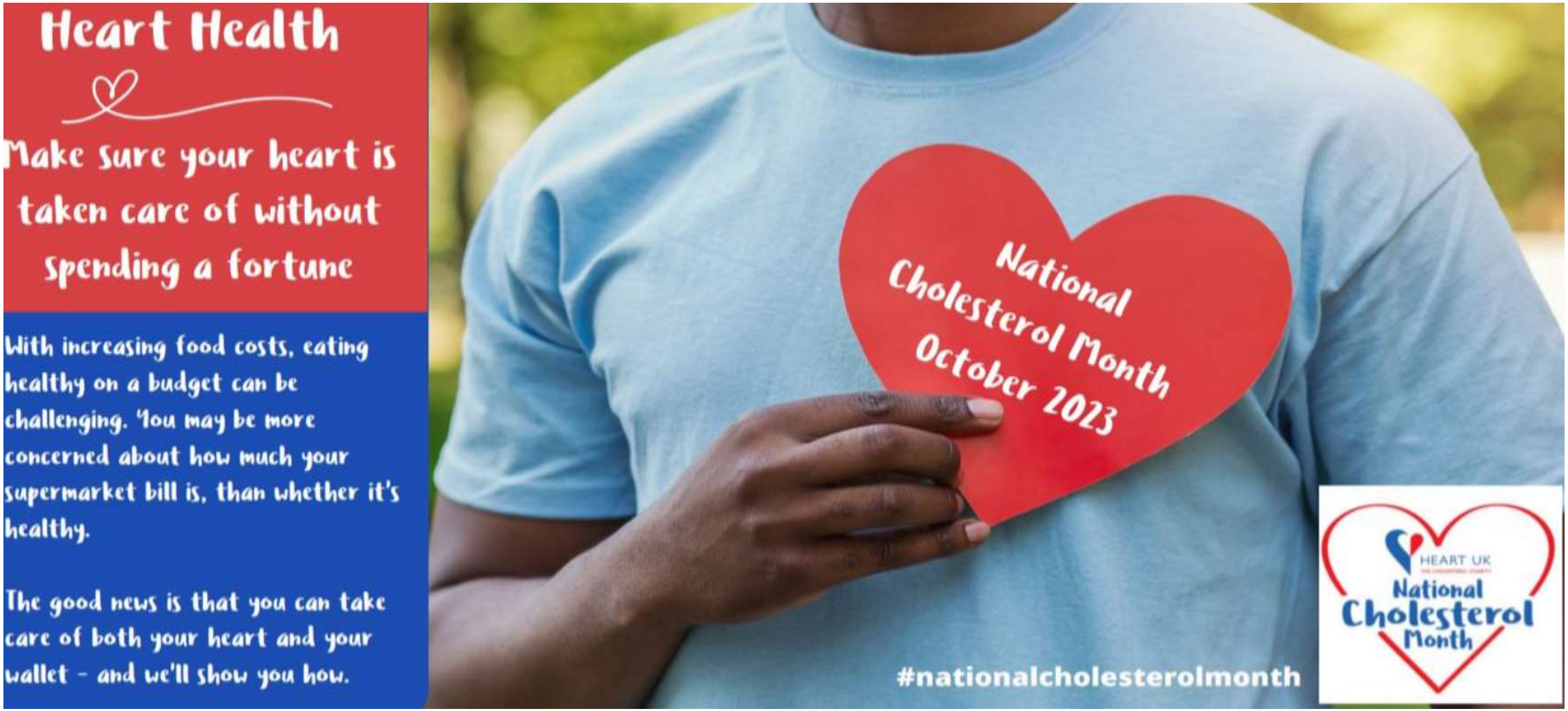
Reflection and action planning

- Take a few minutes to reflect and think about how you can develop your practice/ clinic

- What will you do differently as a result of your learning today?

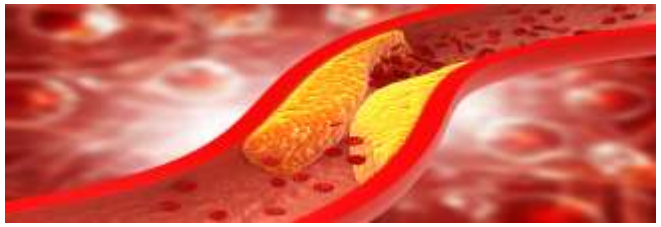
- How can you raise awareness of FH/ Lipid optimisation? (patients/colleagues)
- How can you support people with FH/ raised cholesterol?

National cholesterol month October 2023



Resources

RC GP LEARNING



Genomics Education Programme

Academic Health Science Network
North East and North Cumbria

NEELI

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