

Hypertension

A guide for Southwark General Practice

Key messages

1. Lifestyle changes are key to reducing CV risk and lowering blood pressure
2. Check for complications and calculate a QRISK 2 or 3 score
3. Aim for NICE blood pressure targets (which are often stricter than QOF)
4. Check blood pressure *more frequently*

Always work within your knowledge and competency

Why focus on BP in Southwark?

Hypertension is a risk factor for having worse outcomes from Covid-19.

Treatment of high BP significantly reduces risk of stroke, IHD, heart failure and all cause mortality¹

- **Risk reduction:** Every 10mmHg reduction in systolic BP reduces risk of major CV events by 20%¹
- **Under-treated:** 45% of Southwark patients <80 years, with hypertension, have a BP >140/90mmHg²
- **Under-diagnosed:** 27,650 people remain undiagnosed (prevalence = 10.6% vs. expected= 19.2%)¹

In Southwark, if we reduce the average systolic BP in people with hypertension by 10 mmHg, in one year, we could prevent¹:

- **67** people from having a stroke
- **47** people from developing heart failure
- **49** people from developing IHD
- **178** deaths

Hypertension diagnosis and assessment, including for people with Type 2 diabetes (T2DM)

Confirm hypertension diagnosis (using ABPM/HBPM) and stratify CV risk^{3,4}

Clinic BP
<140/90mmHg

Clinic BP
**Systolic 140-179mmHg
or Diastolic 90-119mmHg**

Clinic BP
**Systolic ≥ 180 mmHg or Diastolic ≥ 120 mmHg
Severe Hypertension**

Confirm diagnosis, request bloods/ACR + check for complications
Do ABPM/HBPM

ABPM/HBPM
 **$\geq 135/85$ mmHg
Stage 1 Hypertension**

ABPM/HBPM
 **$\geq 150/95$ mmHg
Stage 2 Hypertension**

Urgent (same day) GP review

Target organ damage?

No

Repeat clinic BP
within 7 days (or
urgent
ABPM/HBPM) and
treat accordingly

Yes

Consider treating BP
without ABPM/
HBPM result

Worrying symptoms?

999/A&E

Offer lifestyle Advice (see page 5)

Assess for complications + CV risk (QRISK 2 or 3)

(See page 4)

If <60 yrs +
QRISK 2 or 3
<10%

'Consider' starting
BP treatment

If >80 yrs +
BP >150/90
mmHg

'Discuss' starting
BP treatment*

If <80 yrs and ≥ 1 of:
QRISK $\geq 10\%$
diabetes/renal disease/
hypertensive eye
disease/CKD/LVH or CVD

Start BP Treatment
Use clinical judgment in frailty/multi-morbidity

QRISK 2 or 3 (to assess 10-year CV risk)

**$\leq 10\%$
No statin**

**$\geq 10\%$
Address modifiable risk factors first, then consider initiating or optimising statin if still $>10\%$**

BP every 5 years, or annually if near to 140/90mmHg (use clinical judgement), or if target organ damage/T2DM (see Traffic light page within SELIMOC hypertension guidance 2021 for primary care)

Review BP (recommended at least annually, or more frequently when clinically indicated)
(BP/blood tests/ACR/lifestyle and medication review)

Hypertension diagnosis: additional information

Diagnosing hypertension

How to measure BP when considering a diagnosis of hypertension:

- Measure blood pressure in both arms, if difference >15 mmHg, repeat measurements
- If difference remains >15 mmHg, measure subsequent blood pressures in the arm with the higher reading (note this on EMIS)

When to measure standing + sitting BP?

- In DM, postural hypotension (systolic drop ≥ 20 mmHg from sitting to standing), or age ≥ 80 yrs
- If significant drop/symptoms of postural hypotension, **review medication and treat to BP target based on standing BP**

• Ambulatory BP monitoring (ABPM)

Ensure sufficient readings - minimum 14 readings during waking hours.
Use daytime average BP for diagnosis

• Home BP monitoring (HBPM)

Ensure a validated (and calibrated) BP machine is being used and advise to record two BP readings every morning and evening for at least 4 days (ideally 7)
In practice, disregard the first day's readings and take an average of the remaining readings

Assessing complications

Look for complications (target organ damage – i.e. fundoscopy, urine dip, CV exam) + do a **QRISK 2 or 3**

- **Tests:** renal profile, lipids, FBC, HbA1c, TFT, ACR, urinalysis for haematuria + ECG + fundoscopy
- **Record:** smoking status, physical activity level, alcohol intake, BMI, [waist circumference], family history [use Arden's BP EMIS Template]

Assessing Cardiovascular (CV) risk: QRISK

- As of December 2021, the QRISK2 'calculator' is integrated into EMIS, this may change (responsibility for this lies with EMIS or Ardens), and QRISK 3 calculators can be found online [here](#)
- The calculated CV risk is an estimate. Clinical judgement is required to adjust for factors that the risk calculator does not take into account

QRISK 2&3

- QRISK 3 is a more advanced risk calculator than QRISK 2 as it has additional inclusions such as CKD 3-5, severe mental illness and rheumatological conditions.
- QRISK 2/3 are CVD risk estimate calculators only, and **therefore clinical judgment must be used**. For example, people considered high risk of CVD should already be on/offered lipid management treatment (such as those with type 1 diabetes, CKD 3-5, existing CVD/previous Stroke/TIA, familial hypercholesterolaemia and people aged >85 yr).

When to refer a patient?

Suspect secondary causes OR patient <40 years?

- If you suspect **secondary causes in a patient of any age** e.g. Cushing's, Conn's*
- **If <40 years + BP $\geq 140/90$ mmHg + no evidence of CVD, renal/hypertensive eye disease or diabetes.** The 10-year QRisk can underestimate the lifetime risk of CV events in this cohort.³
- In patients of **African or Caribbean family origin, primary hypertension can present earlier, if in doubt, consider A&G** to discuss need for referral

Refer to specialist clinic for investigation

Worrying symptoms?

- **Life-threatening symptoms** - new onset confusion, chest pain, HF, AKI
- **Accelerated hypertension** - retinal haemorrhage, papilloedema
- **Suspected pheochromocytoma** - labile or hypotension, headache, pallor, palpitations, abdo pain, excessive sweating¹⁷

Immediate: 999 or A&E

*Other conditions which can cause hypertension include: Connective tissue disorders: scleroderma, systemic lupus, erythematosus, polyarteritis nodosa, retroperitoneal fibrosis, obstructive sleep apnoea

Impact of life-style changes on BP⁶

Action	Recommendation	Approx. systolic BP reduction
Reduced weight	Aim for ideal body weight	5-20mmHg/10kg loss
DASH diet	Consume a diet rich in fruits, vegetables, low-fat dairy with reduced saturated and total fat	8-14mmHg
Reduced salt intake	Reduced dietary sodium intake (<1 teaspoon/day)	2-8mmHg
Increased exercise	Regular aerobic physical activity (at least 30 min/day, most days of the week)	4-9mmHg
Reduced alcohol intake	Below or equal to 14 units/week	2-4mmHg

Note: In addition, discourage consumption of excessive caffeine or caffeine-rich products.⁴ Average BP reduction (systolic) from one anti-hypertensive drug= 12.5-15.5mmHg.⁷ The effects of implementing lifestyle modifications are dose and time dependent, and could be greater for some individuals.⁶ In the study used, stress management's impact on BP was variable.⁶

Which BP target? Aim for and maintain at NICE BP targets (or below)^{4, 5, 8, 9, 18}

Which condition?	Which cohort within the condition?	NICE Clinic BP Target <ul style="list-style-type: none"> Use clinical judgment in frailty/multi-morbidity Targets for ABPM/HBPM are 5mmHg lower 	QOF BP Targets <ul style="list-style-type: none"> Targets for ABPM/HBPM are 5mmHg lower
Hypertension, including Type 2 Diabetes (but with no CKD)	Age <80yrs	≤140/90mmHg (ABPM/HBPM≤135/85)	QOF now in line with NICE
	Age ≥80yrs	≤150/90mmHg (ABPM/HBPM≤145/85)	QOF now in line with NICE
Diabetes and Hypertension	Type 2 Diabetes	Same as hypertension if no CKD	If no moderate/severe frailty:
	Type 1 Diabetes + no albuminuria	≤135/85mmHg	≤140/90mmHg (ABPM/HBPM≤135/85)
	Type 1 Diabetes + albuminuria or ≥ 2 features of metabolic syndrome	≤130/80mmHg	But use clinical judgement in Type 1 as NICE targets much lower to QOF
CKD and Hypertension	ACR <70mg/mmol	<140/90mmHg (systolic range = 120-139mmHg)	No QOF target
	ACR ≥70mg/mmol or co-existent Diabetes	<130/80mmHg (systolic range = 120-129mmHg)	
IHD/PAD or TIA/Stroke and Hypertension	History of IHD/PAD	Same as hypertension, if no CKD	No QOF target for PAD, but for rest, based on age i.e. <80yrs ≤140/90mmHg ≥80yrs ≤150/90mmHg
	History of TIA/Stroke	Same as hypertension, if no CKD	

Note: For people ≥80 years with hypertension and T2DM, CKD, PAD, CVD or TIA/Stroke, individual NICE guidance on these areas offers no age-specific BP targets for this cohort. However, NICE Hypertension guidelines (as mentioned above) do suggest a target of ≤150/90 mmHg for those ≥80 years with hypertension, but with frailty/multi-morbidity use clinical judgement.

For CVD patients, consider first-line treatment according to co-morbidities

Hypertension with type 2 Diabetes
(any age or family origin)

Hypertension without type 2 diabetes

Age <55 years and not of Black African or African-Caribbean family origin

Age ≥ 55 years

Black African or African-Caribbean family origin (any age)

Optimise medication to most effective tolerated dose, and check adherence at each step, before stepping up

Step 1

ACEI or ARB*

ramipril/lisinopril or losartan

CCB

[or thiazide-like diuretic if CCB related oedema, or if heart failure**]

amlodipine (or indapamide)

Step 2

ACEI or ARB*

+ CCB or thiazide-like diuretic

CCB

+ ACEI or ARB* or thiazide-like diuretic

Step 3

ACEI or ARB* + CCB + thiazide-like diuretic

If uncontrolled on optimal doses, regard as **resistant hypertension**. Repeat ABPM/HBPM, assess for postural hypotension, discuss adherence

Step 4

Consider further diuretic with **low-dose spironolactone** if potassium ≤4.5mmol/L and good renal function. If potassium >4.5 mmol/L and/or reduced renal function, prescribe **alpha-blocker** (doxazosin) or **beta-blocker** (atenolol/bisoprolol) and/or consider seeking specialist advice

*For people of black African or African-Caribbean family origin, consider ARB instead of ACEI (as increased risk of angioedema with ACEI)

** If hypertension in context of heart failure, please see [CES Heart Failure](#)

Hypertension in Chronic Kidney Disease⁹
(CKD stages 3-5 i.e. eGFR <60ml/min)

ACR <30 mg/mmol

Follow BP algorithm

ACR ≥30 mg/mmol

1st line: ACEI or ARB, then follow BP algorithm

eGFR corrections

Corrected eGFR

Latest NICE CKD guidance (August 2021) **does not recommend** adjusting the estimation of glomerular filtration rate (eGFR) in people of African-Caribbean or African family background

Women with pre-existing hypertension contemplating pregnancy¹⁰

Refer to specialist **pre-conception counselling** (page 9)

Drugs to avoid at conception/in pregnancy include: ACEI/ARB/thiazide or thiazide-like diuretic (increased risk of congenital abnormalities)

NICE guidelines:

Stop ACEI/ARBs and change medication (preferably within 2 working days of notification of pregnancy). Offer alternatives:

- Labetalol if no CI e.g. asthma, nifedipine or methyldopa. Can also remain on amlodipine – GSTT Obstetric Medicine advice
- Target BP ≤ 135/85 mmHg
- Offer aspirin 75-150mg OD from week 12 of pregnancy

Refer to [Hypertension in Pregnancy clinic](#) (GSTT) ASAP

This guidance is aligned to [SEL IMOC Hypertension 2021](#) guidance for Primary Care

Hypertension: preferred medication^{3, 4, 11, 12, 13, 14}

	Drug	Starting dose	Daily Range	Notes (These are not extensive, please refer to the latest BNF for further information, especially titration increments, cautions and contraindications)
ACEIs	1 st Line: Ramipril	2.5mg OD (1.25mg OD in frail/elderly patients)	2.5-10mg OD	<ul style="list-style-type: none">- For people of Black African or African-Caribbean family origin, consider ARB instead of ACEI (as risk of angioedema with ACEI)- Check baseline renal profile (Na/K/Cr/eGFR). Hyperkalaemia may occur, therefore close monitoring of serum potassium is required- Re-check renal profile within 2 weeks of initiation, or dose increase and then at least annually- Titrate ACEI/ARB up at 2-4 weekly intervals to achieve optimal BP control- Initiation/Dose titrations: If serum creatinine increases by >20% (or eGFR falls by >15%) – stop ACEI and seek specialist advice. ACEI dose should only be increased if serum creatinine increases by less than 20% (or eGFR falls by less than 15%) after each dose titration, and potassium <5.5mmol- ACEI/ARB dose should be optimised before the addition of a second agent- Side-effects: Symptomatic hypotension can occur on first dosing – suggest to take at night. Dry cough with ACEI, consider switch to ARB- Caution: Do not combine an ACEI and an ARB to treat hypertension- For diabetic nephropathy ARB of choice: losartan and irbesartan
		2 nd line: Lisinopril	10mg OD	
ARBs	Losartan	50mg OD (25mg OD if >75yrs old)	50-100mg OD	
	Candesartan	8mg OD	8mg-32mg OD	
CCBs	Amlodipine	5mg OD	5-10mg OD	<ul style="list-style-type: none">- Increase after 2-4 weeks to maximum dose of 10mg OD- Caution: Interacts with simvastatin – consider switching to atorvastatin- Step 1: If amlodipine causes ankle oedema, consider using a thiazide-like diuretic instead of a CCB- CI: Unstable angina, aortic stenosis- Side effects include flushing and headaches at initiation; swollen ankles especially at higher doses
Thiazide-like diuretics	Indapamide (IR)	2.5mg OD	2.5mg OD	<ul style="list-style-type: none">- Check baseline renal profile, then after 2 weeks, then at least annually. If potassium <3.5mmol/L or eGFR <25ml/min, stop indapamide and seek specialist advice
Aldosterone antagonist	Spironolactone	25mg OD	25mg OD	<ul style="list-style-type: none">- Step 4: Spironolactone is the preferred diuretic at step 4, but is an unlicensed indication in resistant hypertension (BNF)- Consider only if potassium ≤4.5mmol/L (caution in reduced eGFR <30ml/min, as increased risk of hyperkalaemia). Monitor Na/K/renal function within 1 month and repeat 6 monthly thereafter- If K >4.5mmol/L should be stopped
α-B	Doxazosin (IR)	1mg OD	2-16mg OD (or BD dosing when dose >8mg/day)	<ul style="list-style-type: none">- Consider at Step 4 if potassium ≥ 4.5mmol/L. Initial dose of 1mg usually increased after 1-2 weeks to 2mg OD- At doses above 8mg/day, consider split dosing from OD to BD to reduce BP variation- Caution: Initial dose postural hypotension, avoid in elderly as orthostatic hypotension risk
β-B	Atenolol	25mg OD	25-50mg OD	<ul style="list-style-type: none">- Consider at Step 4 if potassium ≥ 4.5mmol/L.- Beta blockers may be considered in younger people and in those with an intolerance/CI to ACEI or ARBs, women of childbearing potential, co-existent anxiety/tachycardia/heart failure- Particular caution in T2DM: symptoms of hypoglycaemia may be masked- Caution: Increased risk of diabetes when beta-blocker is prescribed with a thiazide diuretic. Beta-blockers can cause bradycardia if combined with certain CCBs e.g. verapamil/diltiazem- CI: Asthma, 2nd/3rd degree AV block, severe PAD
		Bisoprolol	5-10mg OD	
Related Drugs				
S	Atorvastatin	20mg OD	20-80mg OD	<ul style="list-style-type: none">- <u>Please see SEL IMOC guideline on lipid management: medicines optimisation pathways (Sept 2021)</u>- Primary prevention 20mg, secondary prevention 40- 80mg (alternative is rosuvastatin)

AKI SICK DAY RULES¹⁶ When patients have any of the following: **Vomiting, diarrhoea, or general dehydration** due to intercurrent illness, advice to **STOP** taking the medicines listed below (restart after feeling well/after 24-48hrs of eating and drinking normally):

- ACE Inhibitors, ARBs, Diuretics, Metformin, NSAIDs, Sulfonylureas, SGLT2 inhibitors** (e.g. Empagliflozin)

This guidance is aligned to SEL IMOC
[Hypertension 2021 guidance for Primary Care](#)

****Vital 5:** Hypertension, smoking, BMI, alcohol intake and mental health.

Health Inequalities in Hypertension

Our population - South East London (SEL)

The Black African and Black Caribbean population in SEL has greater prevalence of hypertension than any other ethnic group¹ and these individuals have higher risk of stroke due to hypertension, associated with worse outcomes². In South London, these patients are more likely to have **hypertension and diabetes and be approx. 10 years younger when presenting with acute stroke** compared to White ethnicity stroke patients³. The drivers for these inequalities include overcrowded housing, higher levels of deprivation, unemployment, barriers to education attainment and racism^{2,4}.

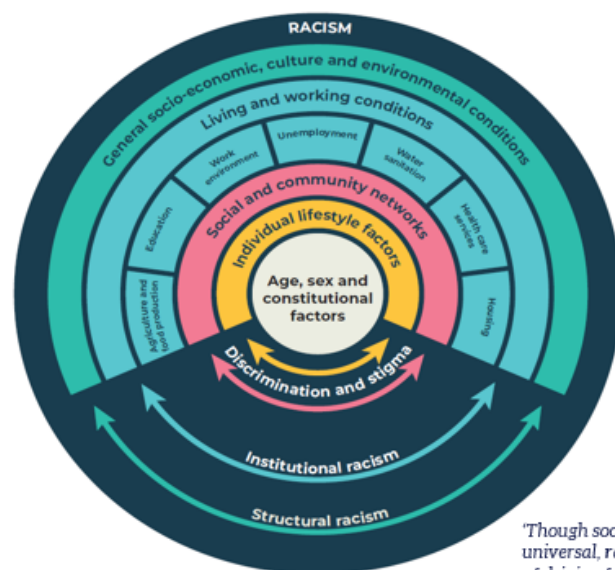
What people have told us ⁵

Barriers to optimal hypertension detection and management include:

Trust – lack of trust in health services generally and not trusting individual healthcare professionals

Access – difficulties accessing services

Racism and the wider determinants of health



"Though social determinants are universal, racism is one of a range of driving forces that exists in our societies and that acts on these determinants."^{4,5}

Racism and the wider determinants of health

Individual actions

- Acknowledge that patients may have experienced racism in healthcare services.
- Re-establish trust with patient-centred consultations and shared decision making⁶

Team and system actions

- Undertake cultural humility training to acknowledge and challenge power imbalances and improve your understanding to support patients in their preferences for their hypertension care^{2, 8}. There are many cultural awareness courses available, find one that has cultural humility at its core and essential components of self-reflection, understanding the impact of your own culture on others and the intent to neutralise patient-provider power imbalances.
- Access the SEL Hypertension Dashboard to better understand the ethnic mix of your hypertension patients¹.
- Ardens case-finder searches can identify those patients without their ethnicity coded in your practice, contact your CESEL facilitator for support
- Consider where you offer your service - community-based blood pressure testing and advice, including pharmacies, places of worship and community events, has high acceptability⁹.
- Patients prefer face-to-face care, especially for a new diagnosis of hypertension⁹.
- Encourage self-care and engagement for example home BP monitors and out of hours drop-in GP attendance for BP testing⁹.

Southwark Patient Support

Patient resources

- Practice connected social prescribing link worker
- [Southwark free gym and swim](#)
- [Southwark Weight management programme](#)
- [Healthy weight advice and support in Southwark](#)
- [Southwark Sport and Leisure](#)
- [Southwark Wellbeing Hub](#) Directory for community resources
- [NHS England » The NHS Digital Weight Management Programme](#)
- Southwark 'Exercise on Referral' Scheme (see DXS)
- British Heart Foundation: [Preventing Heart Disease \(resources for patients\)](#)
- [Home BP measurements](#)
- [DASH diet](#)
- [Stop smoking services](#)
- [Southwark Healthy Lifestyle Hub](#)
- [\(Active\) Pharmacies providing Blood Pressure Checking Service and local SELGP Surgeries \(May 2022\) - Google My Maps](#)

See also page 8 under self-management for excellent BHF patient support

Shared resources

NICE has produced a document on shared decision making in the context of hypertension and it can be found [here](#)

Southwark Clinical Support

Urgent telephone advice- Consultant connect: Cardiology

Non-urgent 'Advice & Guidance'- Depending on the context: Hypertension clinic (GSTT), CKD clinic (GSTT), Diabetic medicine (GSTT/KCH), Obstetric medicine (GSTT), Pregnancy in Hypertension clinic (GSTT)

Virtual hypertension clinics- These are available for practices to organise via the community hypertension clinics (see below)

Community hypertension clinic- Referral criteria on form (see DXS). Can also provide hypertension drug related advice via email: gst-tr.KHPCommunityCVD@nhs.net

Specialist clinics- Refer via eRS to: Hypertension clinic (GSTT/KCH), Pre-conception counselling clinic (GSTT), [Pregnancy in Hypertension clinic \(GSTT\)](#), Obstetric Medicine clinic (GSTT) – for pregnant women with multiple co-morbidities, [CKD clinic (GSTT), Diabetic medicine (GSTT/KCH)]

References

Pages 2- 8

- 1 British Heart Foundation: How can we do better? NHS Southwark CCG (updated 2018, source data QOF 2016/17)
- 2 QOF data analysis March 2021
- 3 [South East London Integrated Medicines Optimisation Committee \(SEL IMOC\) Hypertension guidance for primary care \(April 2021\)](#)
- 4 [NICE Guideline NG136 Hypertension in adults: Diagnosis and Management, published Aug 2019, updated March 2022\(accessed May 2022\)](#)
- 5 [NICE Guideline NG17 Type 1 Diabetes in adults: Diagnosis and Management, published Aug 2015, updated Dec 2020, \(accessed Jan 2021\)](#)
- 6 Simces, ZL, Ross SE & Rabkin, SW, 2012, Diagnosis of hypertension and lifestyle modifications for its management, BCMJ Vol 58(8): 392- 398
- 7 Wu J, Kraja AT, Oberman A, Lewis CE, Ellison RC, Arnett DK, Heiss G, Lalouel JM, Turner ST, Hunt SC, Province MA. A summary of the effects of antihypertensive medications on measured blood pressure. American Journal of Hypertension. 2005 Jul 1;18(7):935-42
- 8 [Stroke and TIA, Clinical Knowledge Summaries \(NICE\), last updated March 2017, \(accessed Jan 2021\)](#)
- 9 [NICE Clinical Guideline CG182 Chronic Kidney Disease in adults: assessment and management, August 2021, \(accessed Jan 2022\)](#)
- 10 [NICE Clinical guideline NG133 Hypertension in pregnancy: diagnosis and management, published date: June 2019](#)
- 11 British National Formulary, last updated Jan 2021
- 12 SE London Area Prescribing Committee and SW London Medicines Commissioning Group (SELAPC):Lipid management for the Primary and Secondary Prevention of Cardiovascular Disease (CVD) in Adults, published Oct 2016, review date Sept 2018
- 13 Consultation correspondence – Southwark CCG’s Medicine’s Optimisation Team, CVD community clinic Pharmacists, GSTT Cardiology Team, GSTT Obstetric Medicine Team
- 14 SE London Area Prescribing Committee and SW London Medicines Commissioning Group (SELAPC): BP monitoring for non-diabetic patients in primary care, published Oct 2014, review date Oct 2016
- 15 [2021/22 GMS contract for Quality and Outcomes Framework](#)
- 16 www.nice.org.uk/advice/KTT17/chapter/Evidence-context
- 17 [NICE Clinical Guidance \[CG181\]: Cardiovascular disease: risk assessment and reduction, including lipid modification, updated 2016 \(accessed Jan 2022\).](#)
- 18 [NHSE: Quality and Outcomes Framework guidance for 2023/24](#)

Page 9: ‘Health Inequalities in South East London’ references

Thank you to the One London Hypertension Pathfinder Project and Mabadiliko for help developing this resource.

1. SEL Pathfinder Hypertension Dashboard. For access please contact bi@selondonics.nhs.uk
2. Birmingham City Council, & Lewisham Council Public Health Divisions. (2022). Birmingham and Lewisham African Caribbean Health Inequalities Review (BLACHIR)
3. Gulli, G. et al (2016). Differences in the distribution of stroke subtypes in a UK black stroke population - final results from the South London Ethnicity and Stroke Study. BMC Medicine
4. Beyond the conversation about race | Better Health For All accessed July 2023
5. The Dahlgren-Whitehead model of health determinants: 30 years on and still chasing rainbows (elevateni.org)
6. Fiscella, K. et al (2004). Patient trust: Is it related to patient-centred behaviour of primary care physicians? Medical Care
7. Schoenthaler et al (2018). Medication adherence improvement similar for shared decision-making preference or longer patient-provider relationship. Journal of the American Board of Family Medicine
8. Lekas et al (2020). Rethinking Cultural Competence: Shifting to Cultural Humility. Health services insights
9. Mabadiliko Pathfinder Public and Patient Engagement Final report accessed July 2023

Abbreviations

α-B – Alpha-blocker	GSTT – Guy's & St Thomas' NHS Trust
ABPM – Ambulatory blood pressure monitoring	HF – Heart failure
ACEI – Angiotensin converting enzyme inhibitor	K – Serum potassium
ACR – Albumin-creatinine ratio	KCH – King's College Hospital NHS Trust
A&G – Advice & Guidance	HbA1c – Haemoglobin A1c
AKI – Acute kidney injury	HBPM – Home blood pressure monitoring
ARB – Angiotensin II receptor blocker	IHD – Ischaemic heart disease
β-B – Beta-blocker	IR – Immediate release
BD – Twice daily dosing	LVH – Left ventricular hypertrophy
BMI – Body mass index	Na – Serum sodium
BP – Blood pressure	NSAID – Non-steroidal anti-inflammatory drug
CCB – Calcium channel blocker	OD – Once daily (dosing)
CI – Contraindication	PAD – Peripheral arterial disease
CKD – Chronic kidney disease	QOF – Quality and outcomes framework (contract)
Cr – Serum creatinine	QRISK* – refers to QRisk 2 or 3 – an algorithm that predicts 10-year CVD risk. EMIS is currently using QRISK2 (although QRISK3 was released in 2017)
CV – Cardiovascular	Renal profile – this includes serum sodium/potassium/creatinine/eGFR
CVD – Cardiovascular disease	S- Statin
DASH diet – Dietary approaches to stop hypertension diet	SELAPC – South East London Area Prescribing Committee
DXS – Point-of-care tool for EMIS Web	TFT – Thyroid function blood tests
ECG – Electrocardiogram (12-lead)	TIA – Transient ischaemic attack
eGFR – Estimated glomerular filtration rate	T2DM – Type-2 diabetes
eRS – Electronic referral system	
FBC – Full blood count	

Acknowledgements

CESEL guides are co-developed by SEL primary care clinicians and SEL experts (see below) and are localised to include brough specific pathways and resources. The guides go through a formal approval process including SEL Integrated Medicines Optimisation Committee (IMOC) for the medicines content, a local borough-based Primary Care Leads group and CESEL Steering Group with representation from SELCCG and PCNs, and borough-based Medicines Management Teams (MMT). CESEL would like to thank all our colleagues who participated and fed-back during the consultation process.

Approval: January 2022

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Contact CESEL at selccg.clinicaleffectiveness@nhs.net and/or visit https://selondonccg.nhs.uk/covid_19/clinical-effectiveness-sel/

Making the right thing to do
the easy thing to do.