



NHS GGC Adult Blood Glucose and Combined Ketone Meter and Test Strip Formulary 2025

Primary Care and Acute Joint Formulary

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Important Note:

The internet version of this document is the only version that is maintained. Any printed copies should therefore be viewed as 'uncontrolled' and as such, may not necessarily contain the latest updates and amendments.

Foreword

The NHS Greater Glasgow & Clyde Blood Glucose and Combined Ketone Meter Test Strip Formulary has been developed to provide practitioners with a selection of preferred meters and test strips for adult patient self-monitoring of blood glucose and ketones.

Practitioners should aim to prescribe a product included in the Formulary and only use a non-formulary product when there is a good clinical reason for doing so. Test strips out with the formulary may only be prescribed on GP10 if there is a clear clinical need for a non-formulary choice to be made.

It is recognised that variation in product choice may occur in specialist areas. In such circumstances providing primary care clinicians with the rationale for an alternative choice to the preferred meters will avoid any delay in the supply of strips and lancets.

Supplies of the preferred meters and starter packs can be obtained by contacting the relevant company as listed in the reference table. Patients should be dissuaded from purchasing a meter themselves without prior discussion with their healthcare professional as strips and lancets will not automatically be supplied.

The Blood Glucose and Combined Ketone Meter Formulary follows the same structure as the NHSGGC Formulary with choices being subdivided into two categories: Preferred List – these represent the first line choices for use by the majority of patients with type 1 and type 2 diabetes requiring a meter; and Total Formulary List – contains specialist meters.

Continuous Glucose Monitoring (CGM)

NHS GGC guidance on the use of CGM can be found [here](#):

Real-time continuous glucose monitoring (eg: Dexcom One+®) and intermittently scanned (flash) glucose monitoring systems (eg: Libre 2 Plus®) are intended to be used as an alternative to routine finger-prick blood glucose monitoring for people who meet the eligibility criteria described in the guidance.

Finger-prick blood glucose monitoring, however is still indicated for this cohort in the following circumstances:

- During times of rapidly changing glucose levels – interstitial fluid glucose levels may not accurately reflect blood glucose levels during these times
- If the CGM monitoring system indicates hypoglycaemia or impending hypoglycaemia
- When symptoms experienced by the patient do not match the CGM monitoring system readings.

Only specialist diabetes teams can initiate patients on Continuous Glucose Monitoring.

NHS GG&C Blood Glucose and Combined Ketone Meters & Strip Formulary

Specific meter & test strip information can be found in the attached Reference Table

Preferred List Blood Glucose Meters & Strips if ketone testing not required

Preferred blood glucose meters for adult patients with type 1 and type 2 diabetes.

- **Contour Plus Blue®**: Easy to read and use. Colour indicator shows if blood glucose is within/above/below target range. Long test strip expiry for infrequent testing. Second chance sampling with same strip.
- **Glucofix Tech GK®**: Easy to read and use. Updated with buttons at the front for ease of use. It uses inbuilt near field communication (NFC) to allow electronic transfer of results to Android and iOS devices.

Preferred List Blood Glucose & Ketone Monitoring in patients with type 1 diabetes

- **Glucomen Areo GK®**: Easy to read and use. Updated with buttons at the front for ease of use. Combining ketone and blood glucose testing in the one meter with inbuilt near field communication (NFC) technology to transfer information to Android and iOS devices.
- **Glucofix Tech GK®**: Easy to read and use. Updated with buttons at the front for ease of use. It uses inbuilt NFC to allow electronic transfer of results to Android and iOS devices.
- **CareSens Dual®**: Easy to read and use. Combines blood glucose and ketone testing in one meter. The addition of Bluetooth™ technology enables easy transfer of information to both Android and iOS devices.

Preferred List Continuous Glucose Monitoring (CGM) Systems

- **Freestyle Libre 2 Plus®**: only to be used in line with the [NHSGGC CGM MDI insulin users guidance](#)
- **Decom One+®**: only to be used in line with the [NHSGGC CGM MDI insulin users guidance](#)

Total Formulary Blood Glucose Meters & Strips




Second line if ketone testing not required

Palmdoc 2®: Has a large screen with speaking function for those with poor vision. It can link via diasend and is multilingual with Arabic, Bengali, Polish, Urdu and English. It can store 900 results.

The Formulary recommendations apply across primary and secondary care.

Supplies of the preferred meters and starter packs can be obtained by contacting the relevant company as listed in the reference table.

Patients should be dissuaded from purchasing a meter themselves without prior discussion with their healthcare professional as strips and lancets will not automatically be supplied.

	Preferred List Formulary Meter	Preferred List Formulary Meter	Second line
Meter	Contour Plus Blue®	GlucoFix Tech GK®	Palmdoc2®
			
Features	Smart Colour range coding Second chance sampling	Large bright display, meal markers	Speaking Function: English, Bengali, Polish, Urdu & Arabic Large screen
Memory capacity	800 tests	730 BG tests	900 tests
Glucose Strip Name	Contour Plus Test Strips	Glucofix Tech Sensor	Palmdoc Test Strips
Drug Tariff price	£5.95	£5.95	£5.90
Test Strips	Vial of 50	Vial 50	2x25 Vials
Strip expiry date	24 months	12 months	6 months
Sample size	0.6 µL	0.5 µL	0.7 µL
Time for results	5 secs	5 secs	5 secs
Range	0.6 mmol/L – 33.3 mmol/L	1.1 - 33.3 mmol/L	1.1 - 33.3 mmol/L
Haematocrit	0% - 70%	10 - 70%	35-50%
Enzyme	Glucose Dehydronase	Glucose Oxidase	GDH – FAD
Wireless connectivity	Bluetooth	NFC or USB cable	USB data output
App name	Contour Diabetes App	Glucolog Lite	
Replacement batteries	Two 3.0V Lithium Batteries (CR2032)	Two 3.0V Lithium Batteries (CR2032)	Two 1.5v AAA batteries
Website	www.diabetes.ascensia.co.uk	www.glucomenday.com	www.palmdoc.co.uk
Connectivity to Diasend	Yes	Yes	Yes
Company details	Ascensia Diabetes Care	A Menarini Diagnostics	Palmdoc
Customer Service	Ascensia Diabetes Care support line: 0345 600 6030 Email: diabetessupport@ascensia.com Website HERE	Tel: 0800 243 667 0118 9444128 Email: customersupport@menarini.diag.co.uk marketingsupport@menarini.diag.co.uk Website HERE	Tel: 0800 994 9995 Email: hello@palmdoc.co.uk Website HERE

	Combined Meter Preferred List Formulary	Combined Meter Preferred List Formulary	Combined Meter Preferred List Formulary
	CareSens Dual®	GlucoFix Tech GK®	Glucomen Areo GK®
			
Memory capacity	1000	Large bright display, meal markers	730blood glucose 100 ketone test
Glucose Strips name	CareSens Pro	Glucofix Tech Sensor	Glucomen Areo Sensor
Drug Tariff price (May 2022)	£9.95	£5.95	£7.25
Test Strips	One vial of 50	Vial 50	One vial of 50 strips
Strip expiry date	12 months from opening	12 months from opening	12 months from opening
Sample size	0.4 µL	0.5 µL	0.5 µL
Time for results	5 sec	5 secs	5 sec
Range	1.1-33.3 mmol/L	1.1 - 33.3 mmol/L	1.1-33.3 mmol/L
Haematocrit	15-65%	10 - 70%	10-70%
Enzyme	GDH – FAD	Glucose Oxidase	Glucose Oxidase
Replacement batteries	Two 3V CR2032 Lithium Battery	Two 3.0V Lithium Batteries (CR2032)	Two 3V CR2032 Lithium Battery
Website	http://spirit-healthcare.co.uk	www.glucomenday.com	www.glucomenday.com
Connectivity to Diasend	yes	yes	yes
Company details	Spirit Healthcare	Menarini Diagnostics	Menarini Diagnostics
Customer Service	0800 881 5423	0800 243 667 Email: myglucomen@menarinini.co	0800 243 667
Working hours	24 hours	Mon- Fri - 8.30-5.30	Mon- Fri - 8.30-5.30
Wireless connectivity	Bluetooth	NFC or USBcable	NFC or USBcable
App name	SmartLog	Glucalog Lite/ Mobile	Glucalog Lite/ Mobile
Carb Counting App	Balansio	RapidCalc	RapidCalc
	Ketone	Ketone	Ketone
Blood sample size	0.5	0.8	0.8
Ketone Strips name	KetoSens	Glucofix Tech β-Ketone Sensors	Glucomen Areo Ketone Sensor
Shelf life strips	Expiry date on pack Foil Wrapped	Expiry date on pack Foil Wrapped	Expiry date on pack Foil Wrapped
DT Ketone Strip Price (10)	£9.95	£9.95	£9.95
Measurement time	8 sec	8 sec	8 sec

Additional Information

Training

Most meters have the same basic functions and the process to obtain a blood glucose and/or ketone reading is similar. However it is important that all patients are trained on how to use their meter and know:

- the purpose of testing
- how to interpret the blood glucose results and what action to take
- how often and when to test
- how to use the meter and the lancing device to achieve an accurate result
- when to seek advice from their healthcare professional

NICE recommend that patients with type 1 and type 2 diabetes who are self-monitoring their blood glucose levels, have a structured assessment at least annually to include self-monitoring skills. In addition to this the assessment should take account of the impact on the person's quality of life and the continued benefit of monitoring.

Good Practice in Self Testing & Safe Storage of Blood Glucose and Ketone Testing Strips - Information for Patients

Specific information is included in product leaflets for meters and strips.

SELF TESTING

- Ensure hands are washed with soap and thoroughly dried (with a clean towel) prior to testing. Contaminants on the skin or excess moisture can affect the accuracy of the reading.
- Ensure sufficient blood sample size is applied to the test strip. Do not add more blood after the first drop has been applied.
- Apply fresh blood drop to test strip immediately after blood drop obtained. Not testing promptly can lead to evaporation of blood drop which can affect accuracy of the reading.
- Do not test with a smeared or spread blood drop as this can introduce contaminants. Also, do not wipe or smear the blood drop onto the test strip, simply touch the test strip and blood drop together without excess pressure.

STORAGE

- Store strips in accordance with manufacturer's instructions. Heat, cold, humidity and moisture can all affect how the strips work which in turn affects the accuracy of the reading.
- Keep strips in their original sealed container only. Ensure container lid is closed properly after each use.
- Check expiry dates of test strips and control solutions. Do not use if out of date. Most strip packaging allows the opening or expiry date once opened to be written on the label
- Store the meter and test strips at room temperature. Keep away from direct sunlight and heat. Do not freeze.
- Do not leave test strips in vehicles for extended periods of time as they are subject to temperature extremes.
- Do not bend, cut or alter test strip in any way.

A Control Solution, available free from meter companies, contains a known amount of glucose and is used to ensure the meter and strips are working correctly. It is advised to routinely use the control solution to test the meter and if there are situations where the blood glucose test results are not as expected.