

Technology FAQ

'The "marketplace" for diabetes technology has become very busy recently. This review summarises developments with devices new to the market.

Omnipod 5

What is it?

An upgrade to the Omnipod Dash Patch Pump system which will be able to incorporate third party CGM data (Dexcom G6 initially) into a Hybrid Closed Loop system.

Is it available in the UK?

No. It has FDA approval (not CE marked as yet) and is in limited rollout in the US – date for UK release not yet announced (likely after Q4 2022).

How is it supplied?

Via specialty team purchase through the national procurement framework on a named patient basis (most commonly supplied via specialist pharmacy at home teams on request from an accredited diabetes specialty team).

What connectivity is available?

The Omnipod 5 handset will communicate (via Bluetooth) with both the patch pump and the sensor to run the loop algorithm. A smartphone App to replicate the function of the handset on personal mobile devices is expected.

Where are the data stored / reviewed?

Both the Omnipod and the Dexcom are Bluetooth enabled and can be read into personal and professional software systems (Diasend/Glooko).

Who is it suitable for?

Those on Omnipod Patch Pump using CGM should benefit in the first place, and use thereafter will be according to NICE approval status for HCL.

Libre 3 CGM device

What is it?

A real-time CGM device with one minute interval data (this is NOT a flash device). It has a smaller profile and reduced waste compared to Libre2. Improved accuracy is claimed.

Is it available in the UK?

Yes, as of 10/3/22.

How is it supplied?

Via specialty team purchase through the national procurement framework on a named patient basis (most commonly supplied via specialist pharmacy at home teams on request from an accredited diabetes specialty team).

What connectivity is available?

Reader device – which is a Bluetooth-enabled personal mobile phone (no commercial reader is available). It does NOT have interoperability with pumps as yet, but this is planned in the future

Where are the data stored / reviewed?

Cloud Storage (via Abbott / Amazon Web Storage) for viewing in LibreView.

Who is it suitable for?

Those who need real-time CGM (pregnancy or those with hypo unawareness) as per NICE guidance 2022. This is not an "upgrade to the Libre 2" but a separate device.

Medtronic Guardian 4 sensor

What is it?

A real-time CGM sensor (upgrade to the G3 version). Accuracy improvement compared to G3 and reduced requirement for calibration of the device.

Is it available in the UK?

Yes. Medtronic has announced it has started to supply this to a limited number of customers who registered for early delivery, and wider roll-out is expected later in 2022.

How is it supplied?

Via specialty team purchase through the national procurement framework on a named patient basis (most commonly supplied via specialist pharmacy at

home teams on request from an accredited diabetes specialty team).

What connectivity is available?

Links directly to a 700 series pump to provide HCL capacity.

Where are the data stored / reviewed?

Data is uploaded to the Carelink Cloud service for viewing in personal or professional Carelink accounts.

Who is it suitable for?

Those using a Medtronic 700 series insulin pump who need incorporated CGM data to drive insulin delivery (hybrid closed loop), generally those with NICE-approved indications for this type of insulin delivery.

Dexcom G7 Sensor

What is it?

An upgrade to the G6 sensor already available from Dexcom with the following features:
Smaller profile / less waste applicator
Faster warm-up period
Improved accuracy

Is it available in the UK?

No – but it has a CE Mark.
UK availability TBA.

How is it supplied?

Via specialty team purchase through the national procurement framework on a named patient basis (most commonly supplied via specialist pharmacy at home teams on request from an accredited diabetes specialty team).

What connectivity is available?

Uses a personal Bluetooth-enabled mobile phone ± smart watch±third party device.

Connectivity with other devices (insulin pumps) is expected but not yet announced.

Where are the data stored / reviewed?

Data are uploaded to the Dexcom / Clarity Cloud service for viewing in personal or professional accounts or via the Diasend (Glooko) service.

Who is it suitable for?

Those requiring a stand-alone CGM device (particularly those who may be using MDI insulin via a connected pen where the ability to access CGM data and pen data through the same software – Diasend- may be of particular benefit).

Dexcom one Sensor**What is it?**

A 'low-cost' real-time CGM sensor.

Is it available in the UK?

No – but is expected during Q2/Q3 2022.

How is it supplied?

Direct onto prescribing tariff (available therefore via high street pharmacies).

What connectivity is available?

Uses a personal Bluetooth-enabled mobile phone ± smart watch±third party device.

Where are the data stored / reviewed?

Data are uploaded to the Dexcom / Clarity Cloud service for viewing in personal or professional accounts or via the Diasend (Glooko) service.

Who is it suitable for?

Those requiring a stand-alone CGM device (particularly those who may be using MDI insulin via a connected pen where the ability to access CGM data and pen data through the same software – Diasend - may be of particular benefit), as per NICE updated review 2022.

NovoPen 6**What is it?**

An upgrade to the NovoPen 5 durable insulin pen (only for Novo Insulins in 3ml cartridges) which has a memory function and NFC connectivity to allow dose and timing information to be uploaded and assessed alongside

glucose data using third party App-based integration.

NovoPen 6 dials in single unit increments, NovoPen Echo+ dials in half-unit increments.

Is it available in the UK?

Yes.

How is it supplied?

Direct onto prescribing tariff (available therefore via high street pharmacies).

What connectivity is available?

It has NFC connectivity and so requires either linking to a mobile phone App (on a device with NFC capability) such as the Diasend App, or can be directly uploaded using a Diasend/Glooko uploader unit (usually sited in specialty service clinics).

Who is it suitable for?

People using Novo insulins in MDI who wish to assess the relationship between doses used and the glucose-lowering effect to improve their dose adjustment planning.

Lilly Tempo Button**What is it?**

An add-on re-usable device to be attached to a new range of Lilly disposable insulin pens (the Tempo Range – similar to Kwikpens, both single unit and half-unit devices will be available) which will add connected-pen status to those devices using Bluetooth connectivity (rather than NFC) using third party App-based integration.

Is it available in the UK?

No. It is FDA approved. A CE mark is pending, likely available Q3 or Q4 2022.

How is it supplied?

Direct onto prescribing tariff (available therefore via high street pharmacies). This is an assumption, TBC.

What connectivity is available?

It has blue-tooth connectivity and so requires either linking to a mobile phone app (on a device with NFC capability) eg the Diasend App, or can be directly uploaded using a Bluetooth enabled PC or Diasend/Glooko uploader unit (usually sited in specialty service clinics)

Who is it suitable for?

People using Lilly insulins in MDI who wish to assess the relationship between doses used and the glucose-lowering effect to improve their dose adjustment planning.

Conflicts of interest : In the last year IC has undertaken educational and consultative activities for the following industry partners as part of his role within diabetes care: Eli Lilly, NovoNordisk, Sanofi, AstraZeneca, Abbott Diabetes Care, Omnipod and Aventis. None of the above represent a conflict of interest in relation to this article.

Correspondence: Dr Iain Cranston
Consultant Physician,
Diabetes & Endocrinology,
Portsmouth Hospitals University NHS Trust.
On behalf of the DTN National Committee.
E-mail: iain.cranston@porthosp.nhs.uk

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