### Propel@YH Net Zero Innovator Showcase Event

30<sup>th</sup> November 2021







#### Housekeeping

We will be recording the meeting for those unable to attend today

Please mute yourself if not speaking

Feel free to turn off your camera but turn on if speaking

Q&A- Use chat function throughout

Also Q&A time allocated in agenda

#### Agenda

Item	Speaker	
Welcome	Frank Swinton Climate Change Lead, West Yorkshire Health and Care Partnership	
Thoughts and Insights into the Links between Innovation and Climate Change	Frank Swinton Climate Change Lead, West Yorkshire Health and Care Partnership	
AHSN Network and YHAHSN Climate Change Strategy	Kathy Scott Deputy CEO, Yorkshire & Humber AHSN	
Propel@YH Net Zero Programme	Victoria Vaines Programme Manager, Yorkshire & Humber AHSN	
Patients Know Best	Tom Gausden Senior Business Manager, PKB	
Dignio	Ewa Truchanowicz Managing Director, Dignio	
Closing Remarks	Frank Swinton Climate Change Lead, West Yorkshire Health and Care Partnership	



# Thoughts and Insights into the Links between Innovation and Climate Change

Frank Swinton, Climate Change Lead, West Yorkshire Health & Care Partnership









## Transforming Lives Through Innovation

# AHSN Network and YHAHSN commitment to supporting the NHS Net Zero ambitions

**Kathy Scott Deputy CEO, Yorkshire & Humber AHSN** 





## The "Delivering a 'Net Zero' National Health Service" publication references innovation and the AHSNs

To support the future development and adoption of new technologies and innovations, the NHS will:

- require all applicants to national innovation support programmes to consider and articulate the environmental impact of the products and services for which they are seeking support
- embed sustainability in assessment criteria and decision-making processes for all innovation programmes by the end of 2020
- work with the Academic Health Science Networks (AHSNs) to embed net zero into the AHSNs' business as usual processes, working with them to develop a network-wide ambition and identify specific ways of working to promote the drive to reach net zero
- Use the AAC Horizon Scanning Function to identify the future pipeline of innovations which can support efforts to transition to net zero

## Our work changes how healthcare is delivered; this can, and will, have an impact on the environmental harm healthcare causes



## The Network already supports environmentally sustainable innovation from idea to uptake



### The MultiCath trial

Southampton



The AHSN Network







## Through our healthcare innovation expertise we will continue to influence and deliver change

#### Online event: Delivering a Net Zero NHS – Reducing the carbon impact of anaesthetic gases

The AHSN Network Environmental Sustainability Community of Interest are hosting a series of sharing and learning events that aim to share best practice innovations and initiatives to support delivery of a Net Zero NHS.



#### Delivering a Net Zero NHS - maintaining the momentum

Pete Waddingham, Programme Manager - Yorkshire & Humber AHSN





Getting started with Environmental Sustainability; Learning from the Journey in Newcastle

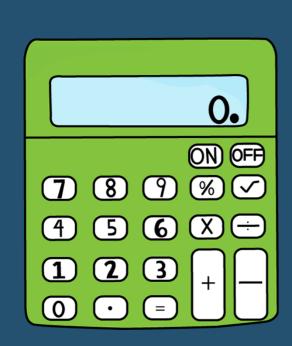
June 23 @ 10:30 am - 12:00 pm Getting started with Environmental Sustainability; Learning from the Journey in Newcastle

## Locally, we are working with our ICS and Regional NHSEI Leads to support regional ambitions



oinpoint

New accelerator programme launches to help reduce NHS carbon footprint











## In summary, AHSNs contribute to Net Zero in 4 main areas:



Through technology, services or products that specifically address the agenda as their primary focus



Through transforming pathways with a side benefit of reducing emissions



By supporting our supply chain to be greener



By improving understanding and changing culture of staff and patients and their families



Propel@YH
NetZero

**Transforming Lives Through Innovation** 

Propel@YH Net Zero

Victoria Vaines
Programme Manager, YHAHSN







- Commissioned by WYH Climate Change Team to support innovators with a 'green' innovation.
- Pilot accelerator programme running in Summer 2021.
  - Introduction to AHSNs
  - Introduction to the Greener NHS Team and priorities
  - Funding and Bid Writing
  - NHS Digital and Carbon Calculators
  - Comms and Engagement



## Propel@YH NetZero

## Feedback and Learnings



Have conducted an end of session survey with the innovators to understand impact.



Overall the innovators liked the process and the range of topics covered



They felt like we had supported them to improve their sustainability plans and communication



They would have liked the sessions/programme to be longer and have more opportunities to engage with stakeholders e.g. procurement

#### **Our Three Innovators**









A digital personal health record platform that allows patients to access tailored resources created by their healthcare teams to enable selfmanagement of their condition.

A digital integrated care platform that connects both patients and healthcare, providing virtual remote care. It is patient-focused and empowers the user to self-manage their condition with the support from healthcare professionals.

An easy-to-use 3D printer which makes healthcare products from sustainable plastics. Like a vending machine, users choose equipment from its onscreen catalogue, and it is made in front of them. It removes delivery costs, delays and reduces climate impact.







@patientsco & @PkbTom



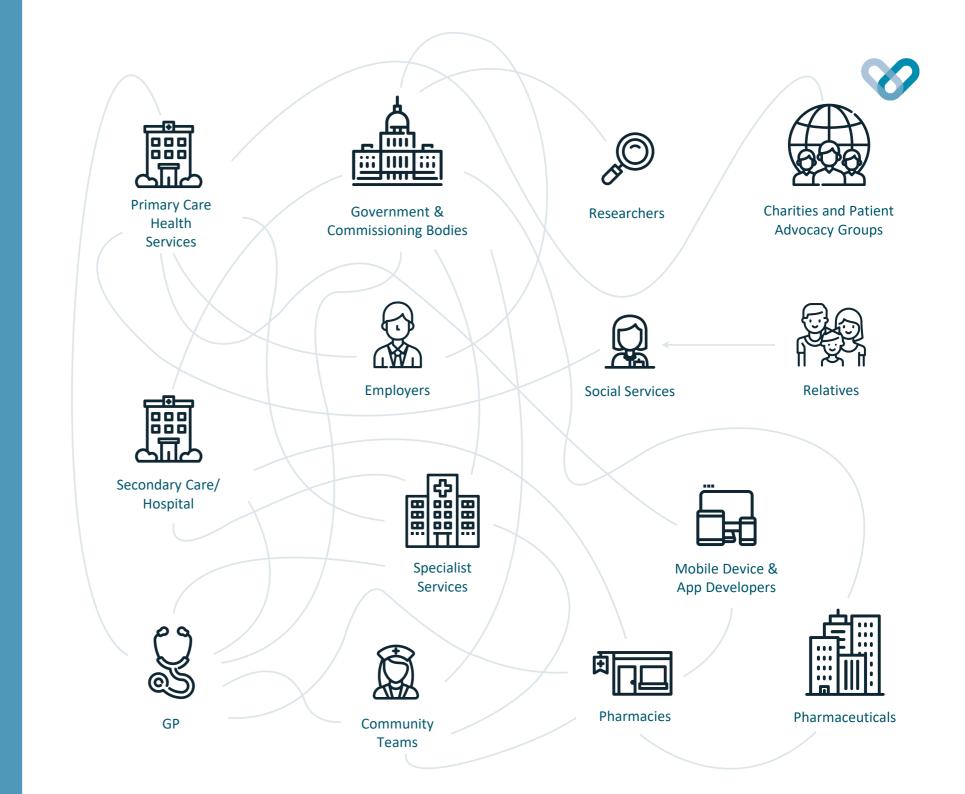
tom. gausden @patients know best. com



www.patientsknowbest.com

#### The Problem

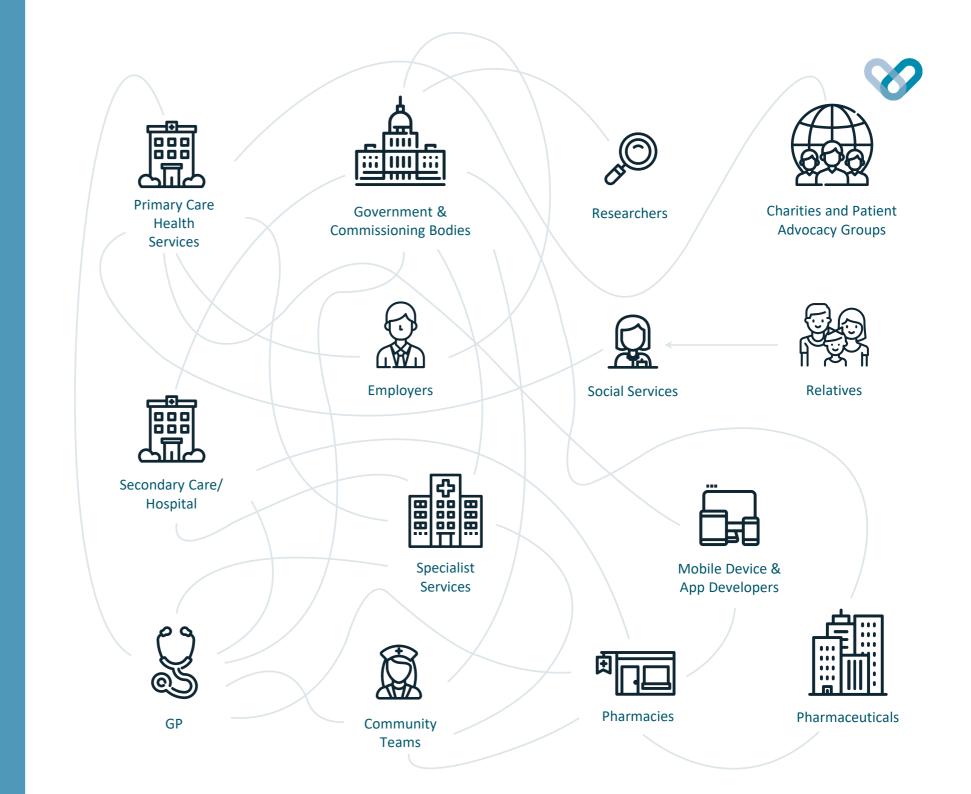
- Difficult to connect
- Technical problems
- Legal issues
- Patient excluded
- No one feels in control

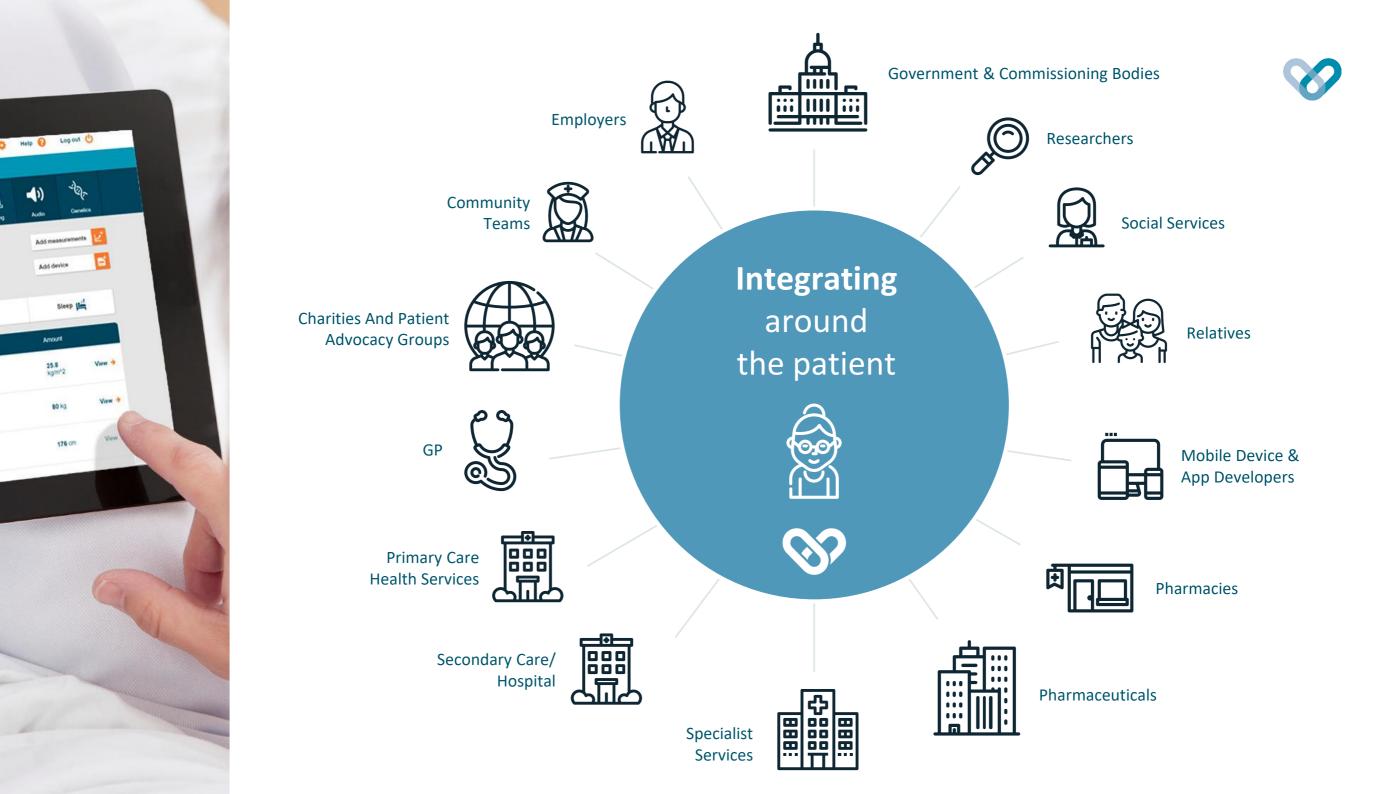


#### **The Problem**



Health care forgot about the patient







#### Digital Tools In PKB















Asynchronous Messaging

Symptom Tracking

Assessment Questionnaires

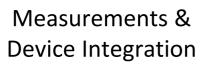
Library of resources

Test Results

Care Planning

Journal Entries







Audio



Diagnosis,
Medications &
Allergies



Files featur e



Appointment Data



Imaging (CT/X-Ray)

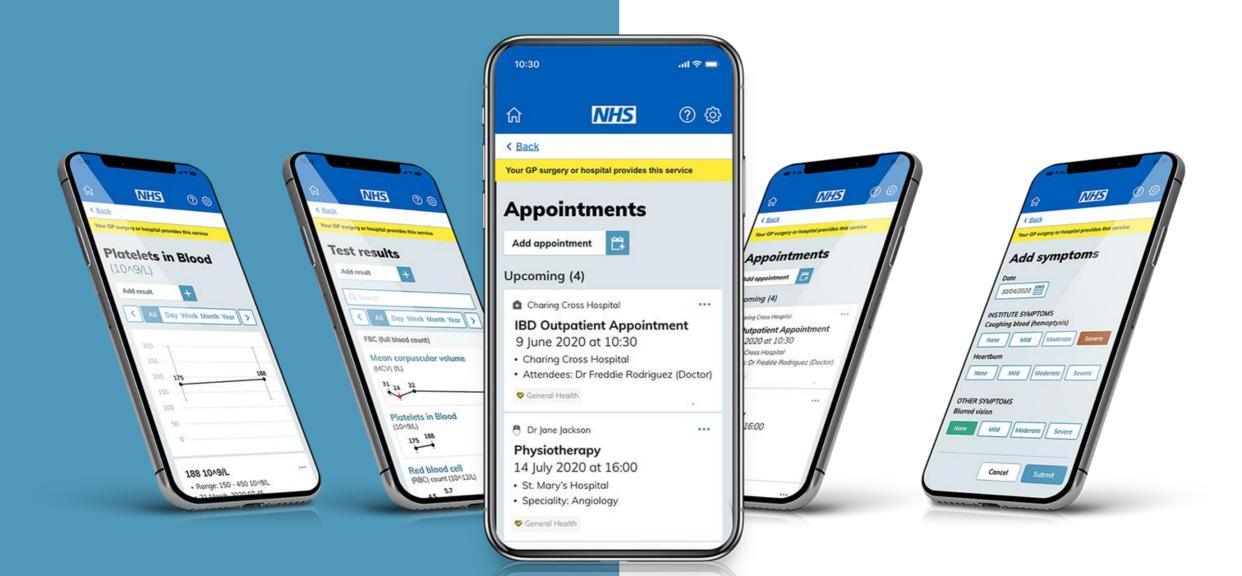


Sharing of data

## PKB is first and only PHR integrated with NHS App and NHS login

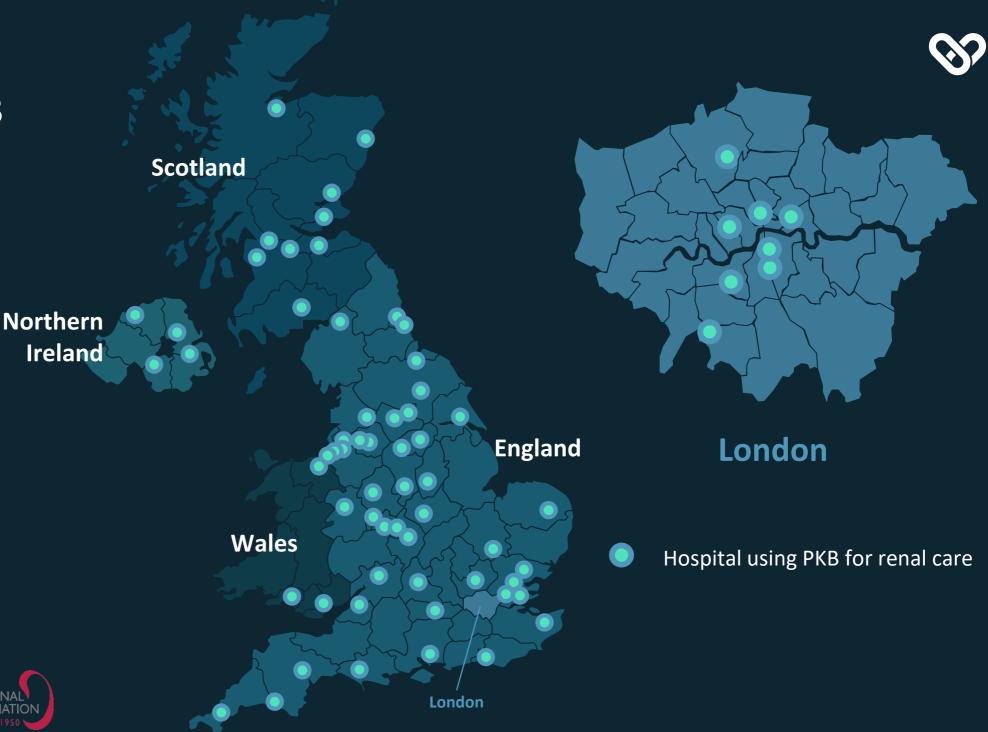
## NHS Login single sign-on into PKB NHS App user interface embeds PKB functionality





### **Renal Patient View Switches** to PKB

- Five year agreement signed in October 2020
- 74,500 patients set to switch to PKB from RPV
- "Partnering with a leading provider of digital personal health records is a significant step for the Renal Association and showcases our determination to provide quality platforms for patients to streamline their care." Chief executive of the Renal Association, Ron Cullen

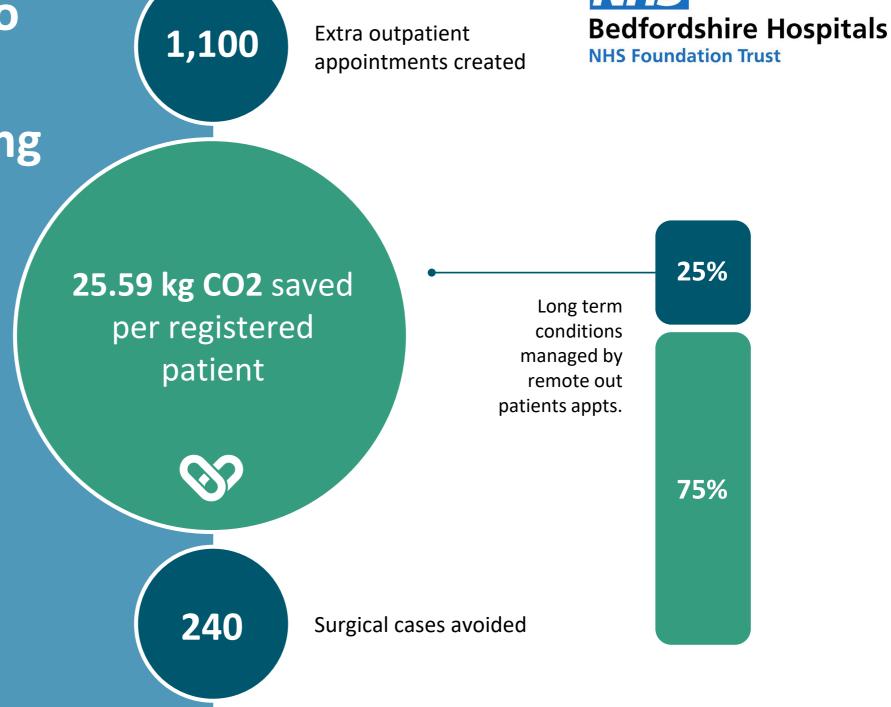






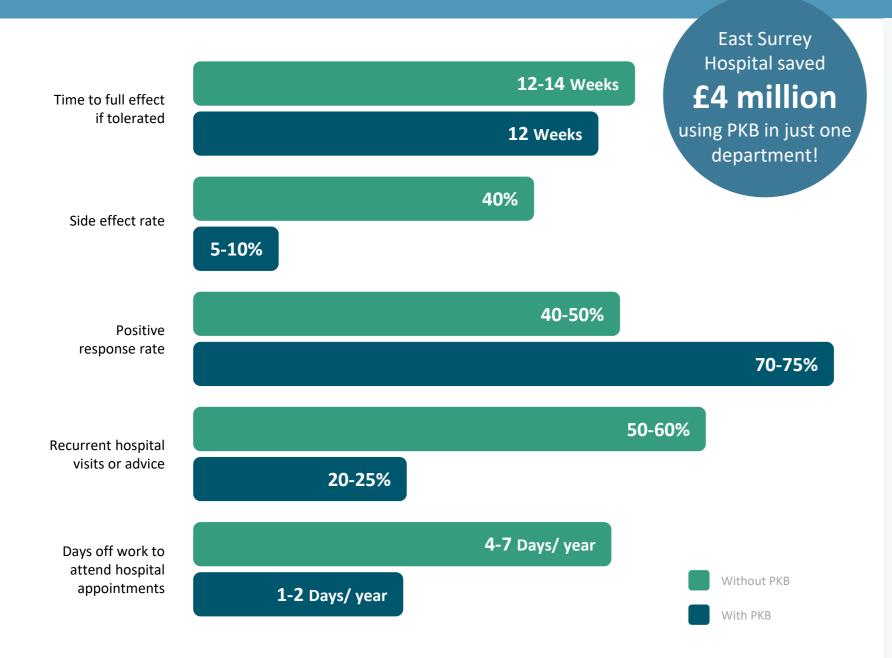
Enabling patients to manage their own health and wellbeing

- Luton & Dunstable implemented virtual outpatient clinics for patients with Crohn's and Colitis and moved 600 patients
- Self-management care plan with symptom tracking
- In three years there have been no emergency admissions



#### **Patients Know Best Saves Money and Improves Patient Outcomes**







"Sometimes I have trouble leaving the house when I have a flare-up so the system's been really good for having a discussion without coming in for an appointment. And also I can check it on my phone so it's been really useful."

Beckie



"I was visiting my mother and had a cardiac incident needing hospital for two days. With my heart doctor in Watford and my ulcerative colitis doctor in Luton I was able to get the right medication for both conditions straight from iPhone in the hospital bed."

David



"The system is really good as a wife, I find it gives me peace of mind as well as Allan peace of mind, it's brilliant."

Brenda

#### **Climate Crisis**

4.4% of the world's net CO<sub>2</sub> emissions are from health care

## Move data not patients

- Digitisation avoids carbon emissions
- Remote monitoring prevents need for carbon-intensive treatments e.g. surgery



of UK carbon emissions are from NHS



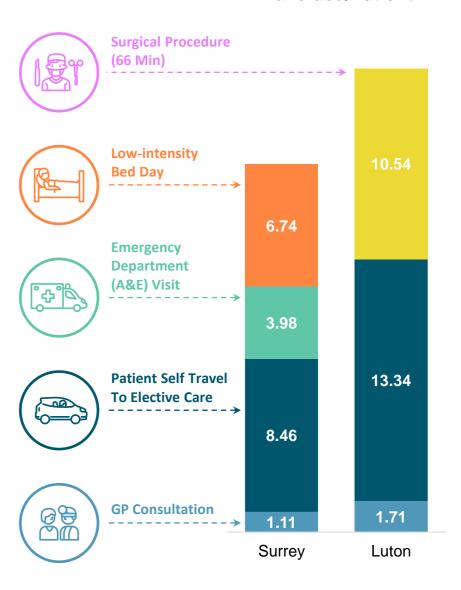
NHS responsible for

5 per cent

of all traffic on roads



#### KG CO<sub>2</sub> emissions avoided/Patient



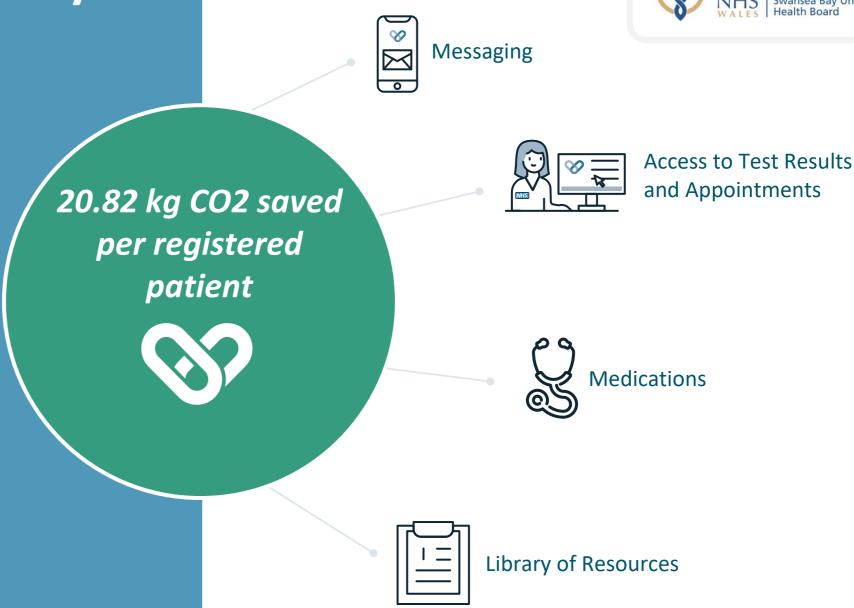
# Swansea Bay University Health Board, Dermaotlogy

Patients that were previously seen on average 4 times a year, now have 1 annual appointment.

Eliminated unnecessary outpatient appointments and reduced the 'follow up not booked' list of patients to zero (\*reported pre-COVID19).

Patients empowered to manage their medication needs, review remotely and message their health team with questions only when needed.

"It puts patients in the driving seat when managing their chronic skin disease."



## Together, we are a force for good.





























#### **Dignio highlights**

**2013** First year of patients on the solution

200+ Active customer organizations on our solution across Norway, China and the UK

>40k Patients serviced through Dignio Connected Care across pathways

90% Norwegian RPM market share

**44%** Fewer hospitalizations

90% Feel more in control of own health



#### What is remote patient monitoring?

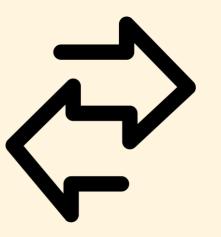
#### One way data capture tools

- + good for simple pathways & data gathering
- Doesn't capture the full clinical picture
- Location specific hardware
- EPR specific



#### **Disease Specific tools**

- + Highly focused
- Multiple apps needed
- Can't grow with the patient



#### Generic, non-flexible tools

- + Multiple use cases
- + Easy to visualise
- Restrictive flexibility
- Difficult to scale
- Difficult to add new pathways



#### Generic, flexible tool

- + Increased flexibility to change as system evolves
- + Integrate across care pathways
- + Scalable Virtual wards/digital transformation
- + Easily add new pathways
- Difficult to visualise



#### **Existing approach to Digital Healthcare provision for patients** Social with complex conditions worker No digital input Wound nurse COPD App Healthcare provider **FUTURE:** New medical, BP Another psychological, A new silo App social condition app Mental Health **Complex for patients** App High cost for ICS No data flow to **Fragmented Design** Diabetes ICS **Important Data sits in silo** Self-App management **Increased Health inequalities** only Minimal integrated care Diabetic

nursing team

#### **Dignio Integrated Care Platform**





A wide range of different e-health solutions combined in one comprehensive platform

CE classified as software as a medical device class 1



Individual/Healthcare Professional

Telemedicine



Clinician

**Remote Patient** Monitoring









Reporting

#### Self Management Plan





Interoperability



#### A solution that follows the citizen through the full care journey

**Fully** Independent

**Domiciliary** 

Care Home

Nursing Home

Care





MyDignio



Dignio Care



Dignio Care



Dignio Care



**Delivering Innovation** in to Health and Care -Medlink West Midlands 2021



**Driving Digital** Transformation Innovation 2021



2021- Winner with Mastercall North of England Healthcare Business Awards



2021 - Finalist with Mastercall Healthcare



Most Transformative Digital Healthcare Company 2020



Start-up Award Medlink West Midlands 2019



Innovative Low Cost **Business Model** 2017

#### Impact on care delivery and experience

#### **Patients**

- Improved sense of security
- Early detection of deterioration
- Improved self-management
- Personalised care



## NHS Net Zero Clinicians

- Efficiency gains
- Access to information when needed
- Transforms communication
- Enables MDT working



Patient satisfaction across all UK deployments (avg)



Clinician/client satisfaction across all UK deployments (avg)

"...my own dad who is in residential care benefited from Dignio, to the point I believe it saved his life."

#### **Mastercall Healthcare**



ROI - annual savings of £6m to the local health system

#### **Salford Royal NHS FT**



Cardiology Patients
Hospital Admissions
Reduction

#### City of Oslo



Lower costs per patient per year



### THE IMPACT OF REMOTE MONITORING

In support of the Covid 19 - Patients in Stockport were given additional support through innovative technology and first-class clinical patient management.

#### DOING MORE FOR PATIENTS

Mastercall Healthcare provided additional monitoring and throughout the pandemic via the TEL Service (Technology Enhanced Living)

#### MASTERCALL WANTED TO DO MORE....

By providing the system with remote monitoring and 24/7 Service powered by DIGNIO in collaboration with Stockport Local Authority.





#### ADVANCED TECHNOLOGY

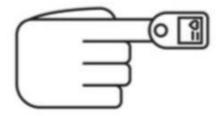
providing patients remote monitoring results direct to a clinical team.



#### MORE EFFICIENT

Care was improved further by .....

904
PATIENTS





644 CARE HOME Residents



44% Hospital Admission Avoidance



MONITORED 21

**PATIENTS** 

MONITORED 68

#### TRAILBLAZING SERVICE

Which has made a tremendous impact......





#### CONDITIONS

FRAILITY, COVID, LONG COVID. COPD HEART FAILURE, DIABETES





#### **EMPOWERS**

THE PATIENT
To be monitored & manage their own health.



UK 1st dignio

& DIGITAL EXEMPLAR Nominated for HSJ Award

## We believe digitising aspects of care can increase value and improve outcomes for organizations and individuals

## Empower users to self-manage



## Target care to users with greatest need



### Reduce hospital admissions



"

I had decided to apply for a place in a nursing home until I started receiving remote care assistance - User (84) with COPD "

The beauty of Dignio is that it will risk stratify the observations, and we can respond appropriately to the patient's needs

- Head of Clinical Team



I haven't been hospitalised at all over the last year. Before, the hospital was my first home, and my own home my second one

- User (71) with COPD

## Example: How Dignio helps organizations deliver better care to patients like Elizabeth



Elizabeth (81)

Hypertension, hypercholesterolemia, type 2 diabetes requiring insulin and chronic pain

#### **Before**

## **In-home adaptations** that allow her to continue living at home (e.g. bathroom adaptations)

**5-6 daily home visits** from her local home care organization

In and out of the hospital in the past years

Poorly controlled type 2 diabetes requiring insulin

#### **Dignio products provided**

#### **Vital signs measurements** (blood pressure, pulse oximetry and glucose)

**Automatic medication dispenser** 

Symptoms tracking via questionnaires

Multidisciplinary care pathways with plans, alerts and schedules for clinicians

#### **Impact**

**Improved control** of own blood pressure and glucose levels, as well as own medication

**Identifies deterioration** before it becomes critical

Increased sense of security & reduced anxiety for Elizabeth and and her family

Secondary prevention by promoting healthy behaviours (diet, physical activity, social contact)



#### A solution for personalised care journey

Methodology	Technology	Scalability	Quality & Standards
Over 10 years of methodology development  Continuous feedback loop and co-design  Collaborative partner, not just a supplier  Change management expertise	Flexible & Dynamic  Cloud based  Connected Care Platform  Interoperable  Communication tools	Feature rich, yet intuitive  30k patients on solution in Oslo alone  One solution for many pathways  Affordable	Passed DTAC  Published DSPT  ORCHA approved  ISO, DCB & other standards compliant  HL7 FHIR

## @ dignio

https://vimeo.com/641221811/b4b6bb4bed