



# myPatientSpace

Digital Health as a Service (DHaaS) Platform

Case Study: Transforming Remote Healthcare Delivery –  
COPD Virtual Wards and the Healthy Islands Project

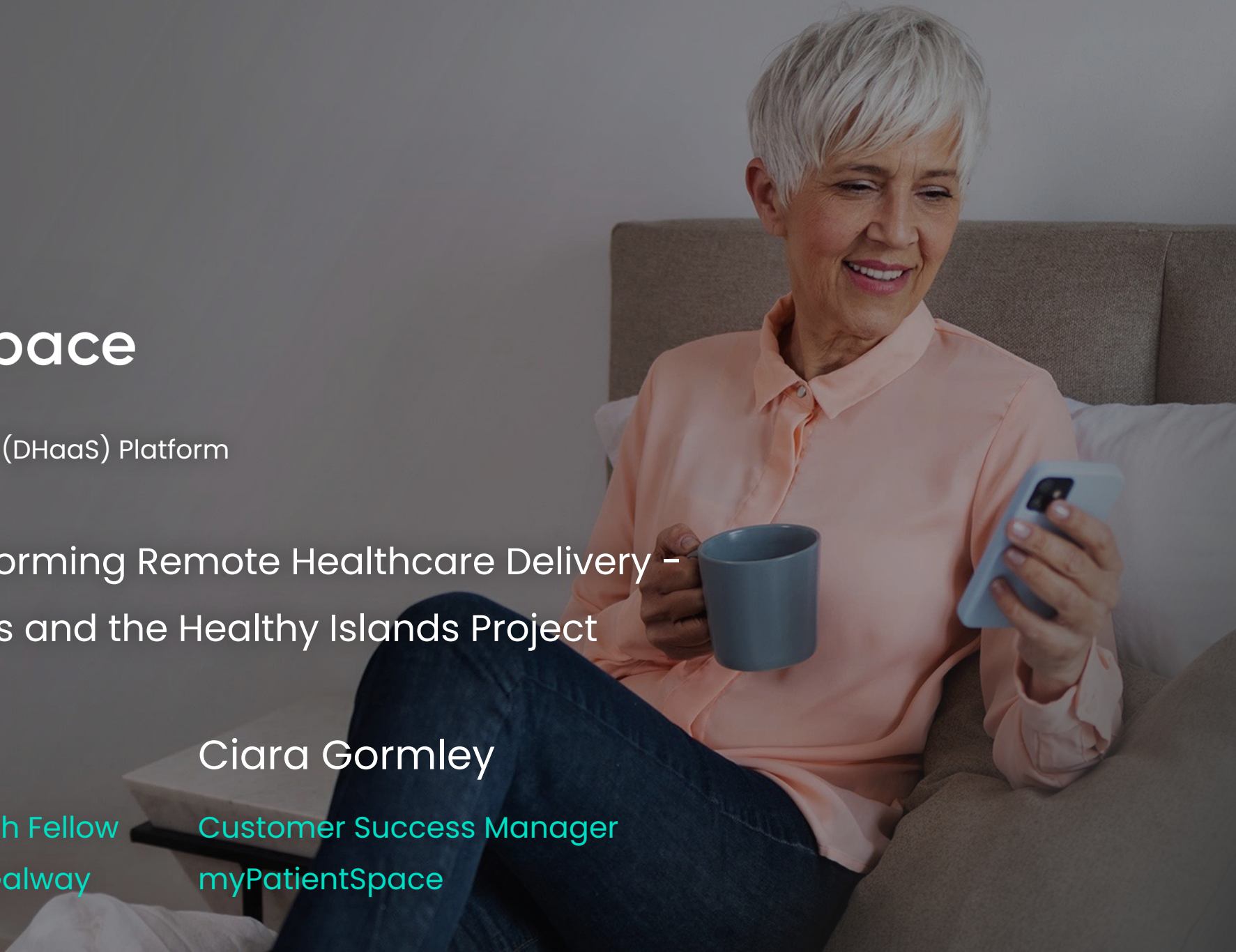
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HIVE Lab, University of Galway

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Customer Success Manager  
myPatientSpace





# myPatientSpace

Mission: To be the leading platform for rapid deployment of innovative remote care models, transforming healthcare with accessible, scalable, and patient-centric solutions.





# myPatientSpace

## Comprehensive Digital Health Platform

### Multi-Disease/Pathway No Code Platform



Purpose built for remote care models – virtual wards and hospital@home



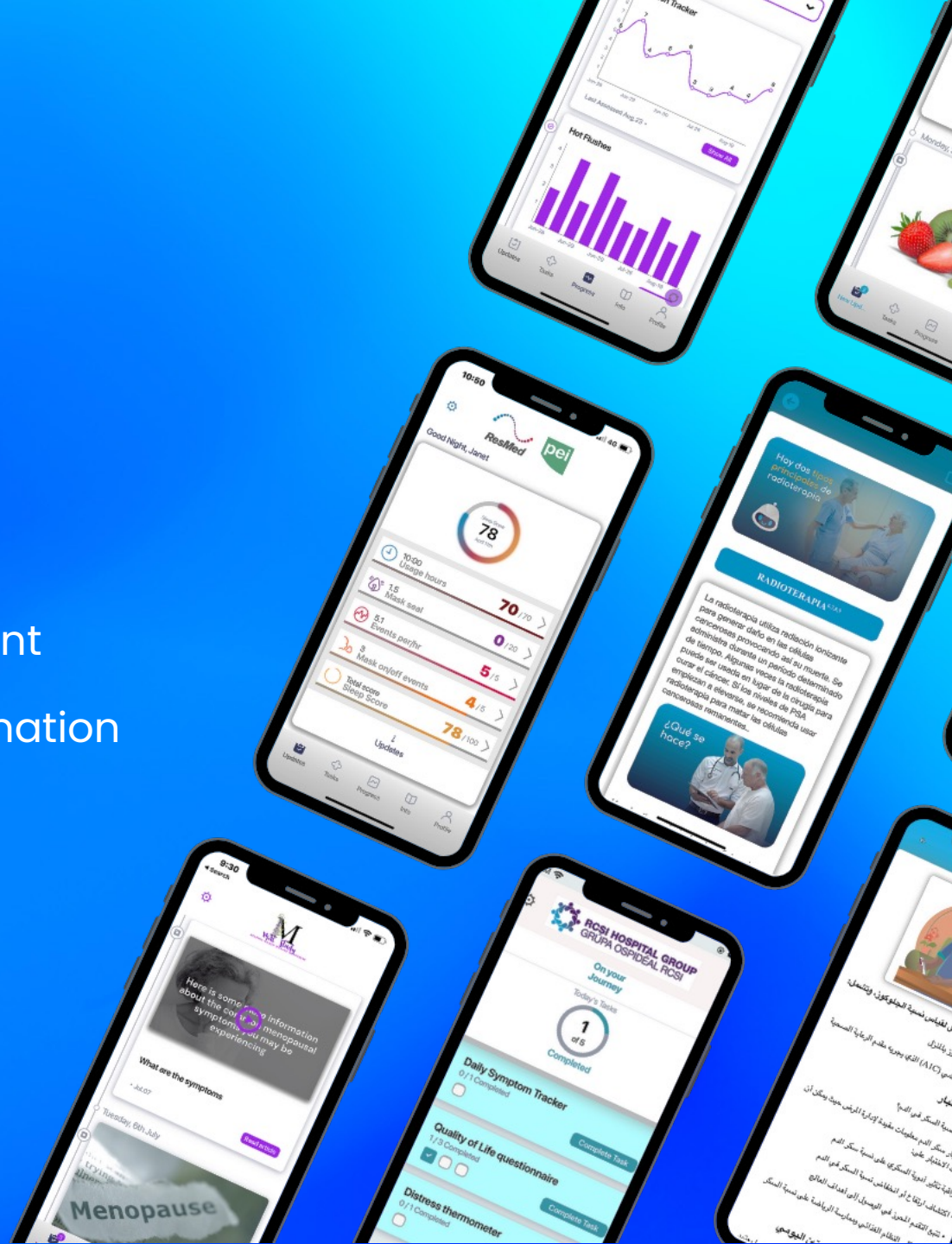
Smart patient engagement & seamless pathway automation/care-coordination



Compliant & Secure Medical Grade, Highly Configurable



Remote Disease Management – Real time monitoring



# Proven across therapy areas

Multi-Disease/Therapy



## Respiratory

Sleep, Asthma,  
COPD



## CVRM

Renal/CKD,  
Diabetes/Cardio



## Cancer

Oncology, Surgery,  
Hematology



## MSK

Rheumatology,  
Orthopedics










## Rare Diseases

Chronic Pancreatitis

myPatientSpace

# Modules and solutions

that can be configured for any Digital Health Program with **no code**

<b>Pathways</b>	 RHEUMATOLOGY	 RESPIRATORY	 SLEEP APNEA	 CANCER	 CVRM	 ORTHO	 Many OTHERS
<b>Solutions</b>	Virtual Wards/RPM		Patient Engagement / Disease Management		Pre/Post Surgery		Digital Patient Support, Studies, Companion Apps
<b>Modules</b>	Scheduling / Reporting / telehealth	Rapid configuration / no-code	Rich content	Connected devices	Collaboration Chat	AI / smart pathways	E-pro's, surveys, e-consent, quizzes, rewards



No-Code Digital Health Platform

Critical Pillars for Success in Digital Health:  Compliant  Secure  Adaptable  Interoperable  Scalable

# Easy to configure Underpinning with Gen AI

Connected  
Devices



Digitize Smart  
Pathways/AI

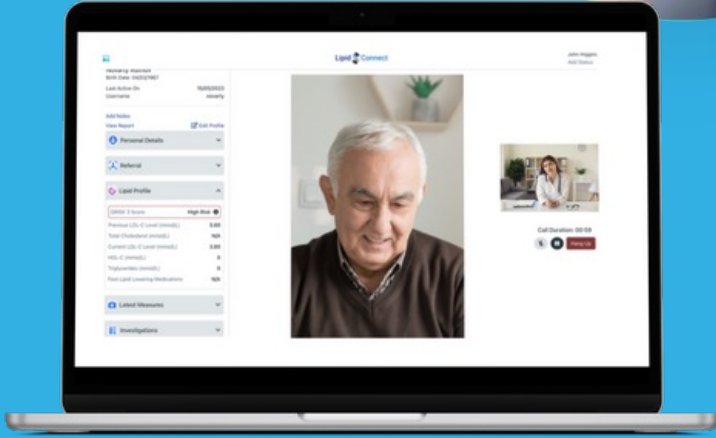
Rich Digital Health  
Companions/Chat  
Bots



Staff  
Mobile/Web  
Integrated

# Customizable Workflows and Patient Engagement

Multiple languages & regions (Arabic..)



Remote Patient Management & Intelligent CarePlan Automation & Dashboards



# Integrated devices & external systems



22:19

**Time to upload your RR Data** now  
Your respiratory rate data upload is due - please submit now.

**Oximetry**  
0 / 1 Completed  **Complete Task**

**Quality of Life**  
 **Complete Task**

10:47

**My Devices**

- Withings**  
An account on Withings is required  **Connect**
- FitBit**  
An account on FitBit is required  **Connect**
- DexCom**  
An account on DexCom is required  **Connect**
- Omron**  
For Bluetooth-enabled Omron devices  **List**

**you understand COPD?**  
 **Complete Task**

**Review**  
 **Complete Task**

**Activity Tracker**  
 **Complete Task**

messages. Tap New  
om bar to view.

Progress Info More



# Trusted Globally & Available NHS



Crown  
Commercial  
Service

DPS Spark



EIT Health is supported by the EIT,  
a body of the European Union



Medical Device

Orcha rated 88%

CyberEssentials certification

QMS-ISO 13485 certified

HIPAA and GDPR compliant  
technology

Multi-regional cloud/multi-lingual

Built as an Enterprise SaaS Platform

Integrations to EHRs/PAS/other  
systems

ISO 2700 certified

Multi lingual support



# Galway COPD Virtual Pathway & Healthy Islands

myPatientSpace Case Study

# The problem

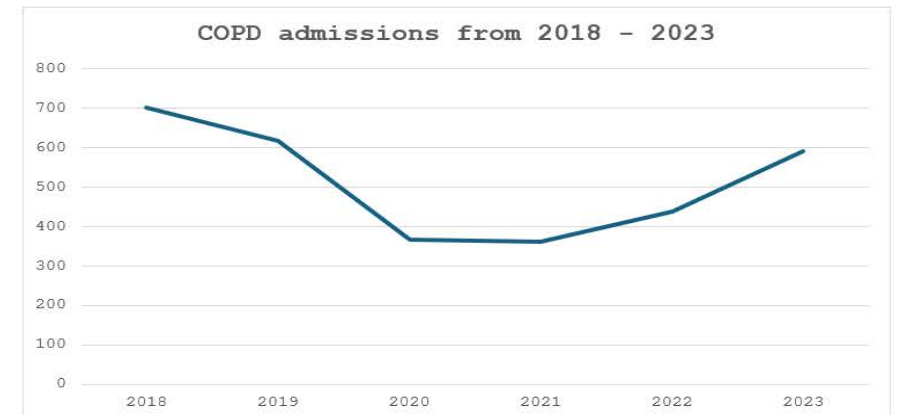
## “Trolley Crisis”

- In May 2023, over 11,800 patients were admitted to Irish hospitals without a bed<sup>1</sup>
- Population growth and ageing of the population will increase demand further here and globally
- Hospital is most expensive B&B in town – from a financial & human standpoint
- Hospitals are built for acute care not chronic disease management



# Overview COPD Pathway

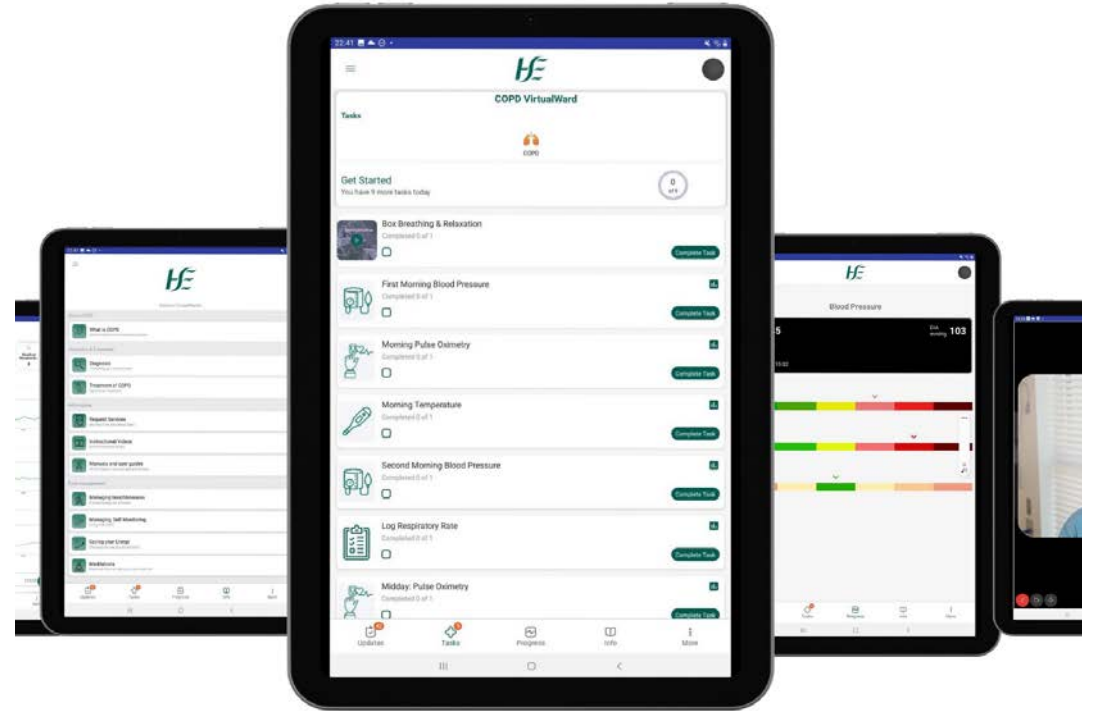
- Goal reduce COPD Admissions and improve care for patients
- Started April 2024
- 3 Arms:
  - Early discharge
  - Admission avoidance
  - Readmission prevention
- Consultant Led Governance – Dr. Sinead Walsh.
- Ethics and Governance.
- myPatientSpace Platform, kit and managed tablet.
  - HSE (eHealth Ireland) approved RPM, DPIA in place
  - Monitored by Nursing staff 8:00-16:00 Mon-Fri
- BP, SpO2, Thermometer.



# Enablers

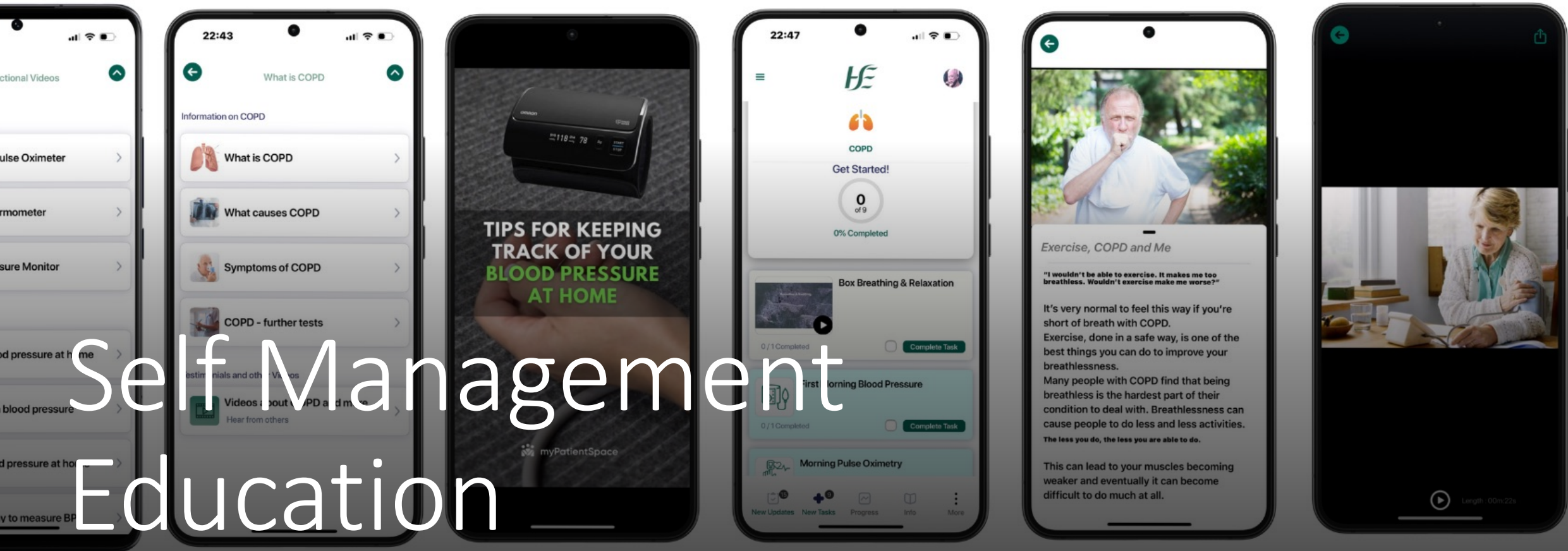
- Enthusiastic & competent team members: specialist nurses
- Galway Hive Team
- Care at home supporting patient recovery, overwhelmingly preferred by patients
- Patient testimonials
- Alternative care pathway: allows increased bed capacity in acute service, reducing health service pressures
- Cost effective
- Research opportunity



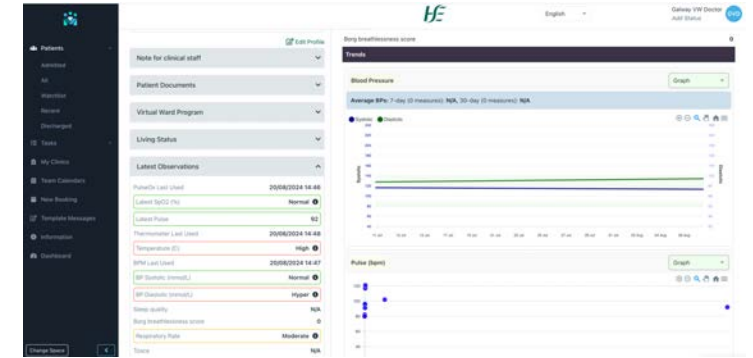


Patient Kit and Tablet

# Self Management Education



# Monitoring



Latest Measurements		
Latest SpO2 (%)		98
Latest Pulse		92
PulseOx Last Used	20/08/2024 14:46	
BP Systolic (mmHg)		112
BP Diastolic (mmHg)		98
BPM Last Used	20/08/2024 14:47	
Temperature (C)		37.90
Thermometer Last Used	20/08/2024 14:48	
CAT Score		
Borg breathlessness score		0
Trends		

**Miss Tejessini Manasi**  
COVID Patient

089 229 5381  
Age: 28  
**Discharged**  
Date of Birth: 30/06/1994  
Email: manasihj@gmail.com  
Admission Date: 12/06/2024  
Discharge Date: 18/06/2024  
Care Team: GatewayTestTeam

**Cohort: Admission Avoidance**  
Discharge Reason: Eventful episode of care discharged with use of remote-script antibiotics & steroids  
Priority: Urgent  
BP Last Used: 20/08/2024 14:47  
Thermometer Last Used: 20/08/2024 14:48  
PulseOx Last Used: 20/08/2024 14:46  
Remote Monitoring Kit Number: 12  
Remote Monitoring Kit Assigned: Assigned

**NEWS2 Score**  
News2 last calculated date: 2024-08-20  
Latest SpO2 (%)  
Latest Pulse  
UCOPO Total  
Daily Assessment Score  
Temperature (C)  
BP Systolic (mmHg)  
BP Diastolic (mmHg)  
Borg breathlessness score  
Respiratory Rate



22/07/2024, 15:54:36

2-2cb1-4e45-8caa-5489adb6c974 1 / 3 100%

Follow up	THINGY
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RVW Admission Date 22/07/2024		RVW Discharge Date 22/07/2024					
Symptom Scores & Obs On Admission	CAT	mMRC	BORG	spO2	RR bpm	tcpCO2 kPa	
		4		98	21		
Symptom Scores & Obs On Discharge	CAT	mMRC	BORG	spO2	RR bpm	tcpCO2 kPa	
	25	4	0	98	21	40	

Confirmed Diagnosis of COPD by Spirometry Yes			When
Smoking Status		Cannabis	22/07/2024
FEV1/FVC	11		GOLD
FEV1	11.0		GOLD 2 (50-79%pr)

Comments: Last hospitalisation for AE-COPD  
GP Visits in last year  
Admissions in last year



Galway University Hospital and CHO2 Integrated Care Hub Respiratory Virtual Ward

Patient Name: Miss Tejaswini Manavi DOB: 30/06/1994 Age: 29

Address:

Phone Number: +353892295361

GP:

RVW Admission Date 22/07/2024			RVW Discharge Date			
Symptom Scores & Obs On Admission	CAT	mMRC	BORG	spO2	RR bpm	tcpCO2 kPa
		4		98	21	
Symptom Scores & Obs On Discharge	CAT	mMRC	BORG	spO2	RR bpm	tcpCO2 kPa

Exacerbation History:

History of Presenting Complaint:

Rationale for RVW	Admitted for increased level of care to RVW/Hospital Admission
Cough	
Wheeze	
Shortness of Breath	
Sputum	
Reflux	
Sinusitis	
Rhinitis	

Tuesday, June 25, 2024 12:58 PM

Notes from Task: Discharge Report

by Galway VW Doctor - 4 months ago

Notes from Task: Discharge Report

by Galway VW Doctor - 4 months ago

Discharge Visit

by Galway VW Doctor - 4 months ago

Discharge Visit

by Galway VW Doctor - 4 months ago

note for testing

by Galway VW Doctor - 4 months ago

Wednesday, May 29, 2024 4:04 PM

Notes from Task: Discharge Report

by Galway VW Doctor - 5 months ago

Saturday, May 25, 2024 2:18 AM

Efficiency – tasks, document generation, notes

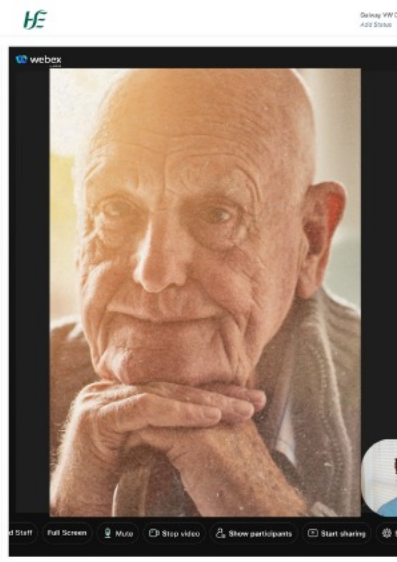
The tablet displays a patient management interface with a sidebar on the left containing navigation options like Patients, Watchlist, Recent, Discharged, Home, Tasks, My Clinics, Team Calendars, New Booking, Manage Schedules, Template Messages, Channels, Content Library, Information, and Dashboard. The main area shows four patient profiles:

- sapna** (Age: 34, Admitted): COPD Patient. Vital signs include Respiratory Rate (Normal 11), NEWS2 Score (17/05/2024 12:43), BMi (Normal 20.55), Latest SpO2 (Low 177), Latest Pulse (23), CAT Score (50.00), UCOFD Total (98), Sleep quality (Good sleep quality (No)), Temperature (Low 135.00), BP Systolic (Normal 111), BP Diastolic (Higher 113), Borg breathlessness score (0.50), and Respiratory Rate (Normal 11).
- Mr Cian Test** (Age: 24, Admitted): COPD Patient. Vital signs include Latest SpO2 (Normal 116), Latest Pulse (24), CAT Score (24), Sleep quality (Good sleep quality (No)), Temperature (Normal 135.00), BP Systolic (Normal 112), and BP Diastolic (Optimal 80).
- Ms Jenny Davies** (Age: 90, Admitted): COPD Patient. Discharge Reason: Eventful episode of care with use of more than one rescue steroid only. Priority: Urgent. Smoker?: 20 or more/day. Date of last hospitalisation for AE-COPD: 28/02/2024. Vital signs include BFM Last Used: 26/03/2024 18:42, Thermometer Last Used: 25/03/2024 15:49, and PulseOx Last Used: 26/03/2024 08:33.
- Mrs Fiona O'brian** (Age: 71, Admitted): COPD Patient. Priority: Routine. Date of Birth: 12/11/1952. Email: mpcommunication24+test@gmail.com.

This tablet shows a detailed view of a patient's vital signs and trends for the period 16/05/2024 - 18/06/2024. The 'Latest Measurements' section includes:

- Latest SpO2 (%): 96
- Latest Pulse: 88
- Latest BP: 133/80
- Latest Temp: 37.50
- Latest SpO2 (Trend): 96
- Latest Pulse (Trend): 88
- Latest BP (Trend): 133/80
- Latest Temp (Trend): 37.50

The 'Trends' section shows graphs for Blood Pressure, Average BP (7-day and 30-day), Pulse (Taps), and SpO2 (percent). A note indicates 'No data recorded in this period' for the Average BP graphs.



This tablet displays a clinical notes and document management interface for Miss Tejaswini Manavi. The 'Note for clinical staff' section includes:

- Clinical Observation Parameters:** 88-92% satS, Target SpO2 (%): 96-100, Contact Preference: SMS, Research Consent Obtained?: Yes.
- Patient Documents:** Documents, Upload, View.
- Virtual Ward Program:** Consent Obtained?: Yes, Program Participation Status: Discharged, Total Admissions to VW: 4, PID: N/A, Study ID: N/A, Cohort: Admission Avoidance, Priority: N/A, Admission Diagnosis: Other specified chronic obstructive pulmonary disease, Discharge Reason: Eventful episode of care discharged with use of rescue-script antibiotics & steroids, Admission Date: 18/06/2024, Discharge Date: 18/06/2024.

The right side of the screen shows a list of tasks and reports:

- Automated task:** Patient Miss Tejaswini Manavi, Created by MPS Tech Support, Due On 24/05/2024, Last Updated On 24/05/2024.
- Discharge Report:** NORMAL, Patient Miss Tejaswini Manavi, Created by MPS Tech Support, Due On 24/05/2024, Last Updated On 24/05/2024.
- Log Scheduled Face-to-Face:** NORMAL, Activity Reporting, Patient Miss Tejaswini Manavi, Created by Galway VW Doctor, Due On 24/05/2024, Last Updated On 24/05/2024.





# Results

47

Patients since April

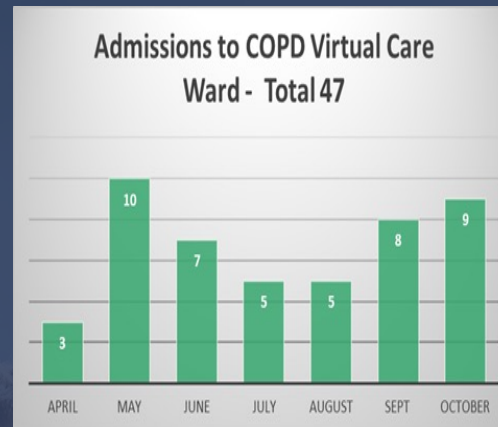
337

Bed Days Saved

100%

Patients would recommend the Virtual Ward

Awards/Posters/Press



### COPD Virtual Care: A paradigm shift away from hospital care to patient-centred care

Emma Burke, Karolina Glomba, Eimear NicDhonncha, Clare Connolly, Derek O'Keefe, Jennifer Davies, Ian McCabe, David Tiernan, Tejaswini Manaval, Hemendra Worikar, Jennifer Doran, Michael Lockhart, Jack Pinder, Sinead Walsh<sup>1,2,3</sup>

- Galway University Hospital
- Community Healthcare Organisation 2 (CHO2)
- University of Galway

*(emma.burke@gha.ie)*

**Abstract:**  
Chronic Obstructive Pulmonary Disease (COPD) is a heterogeneous long-term condition requiring specialist, progressive patient-centred care. It is the most common chronic respiratory cause of acute emergency hospital admissions in Ireland. Virtual ward (VW) was a pioneering solution to address care for COPD patients. The VW aligns with the National Board of Delivery and Personal Health Services, providing right care, in the right place, at the right time, for COPD patients.

The study involved a pilot implementation of the virtual ward with a cohort of COPD patients. It assessed the feasibility and effectiveness of a COPD VW pathway regarding the waiting list, patient service to include remote patient monitoring for acute exacerbation and self-management.

The primary goal is to monitor patients in real time, manage exacerbations effectively, and ultimately reduce emergency department visits and hospitalisation rates.

**Methods:**  
An evaluation of key metrics including hospital admissions, hospital avoidance, length of stay, exacerbations, and patient-reported outcomes of the COPD virtual ward was performed.

The MyAlertBuddy App was used to monitor and record patients' subjective symptoms using validated assessment tools including the modified Medical Research Council (mMRC) and COPD Assessment Test (CAT). Observations included Oxygen Saturation, Blood pressure, Heart rate and Temperature.

The App also measured patient-reported outcomes using a 5-point Likert scale such as COPD and Patient Satisfaction Survey.

**Results:**  
COPD VW has provided 91 care episodes since its initial launch in April 2024. The average length of stay (LOS) is 7.8 days, 55.6% improvement on LOS compared to the national average.

The HSE data report (2024) admissions savings of 85273 per COPD hospital day. This pilot to date has saved 337.6 beds.

Patients reported outcomes showed that COPD care "has to remain on the Virtual Ward" (see table below).

**Conclusions:**  
Findings from this study have already provided valuable insights into the potential benefits of a COPD VW and informed future efforts to scale and embed this innovative care model.

The COPD Virtual Care Ward has improved access to care and also demonstrated significant benefits in reduced hospital admissions, patient satisfaction, and resource optimisation. The savings shift away from hospital care and towards patient-centred care has allowed healthcare providers to identify and address exacerbations early, reducing hospital admissions and enhancing overall quality of life for patients.

**Future Recommendations:**  
Expanding the COPD Virtual Care Ward to other COPD services and The Regionalised Hub has the potential to reduce hospital admissions by addressing health concerns at the primary care level before they escalate into more serious issues requiring hospitalisation. This proactive approach will contribute to better health outcomes and optimising healthcare resources.

**Bed Days saved = 205.4**

**Length of Stay (LOS)**

**Number of Patient Contacts = 202**

**Integrated Healthcare: Advancing Health Service Reform Conference**

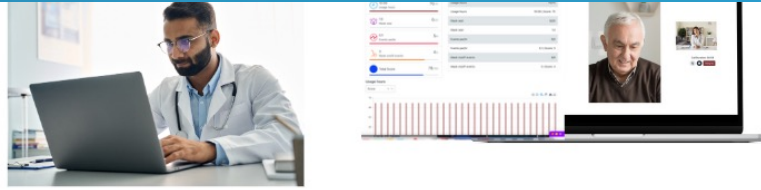
### Integrated Healthcare: Advancing Health Service Reform

Thursday, 5 September  
8:30am to 4pm  
The Convention Centre,  
Dublin

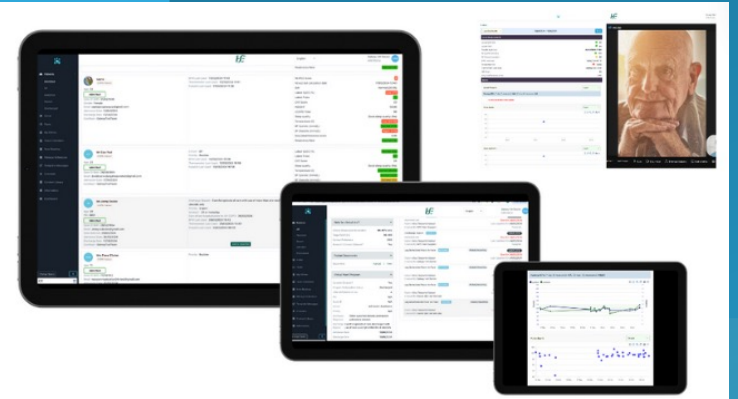


PIC-COLLAGE

- Saves Hospitalization
- Saves Nosocomial Infections
- Saves Stress / Time / Money
- Saves the Planet, less kms travelled!



GPs and Consultants can remotely engage



Local Teams

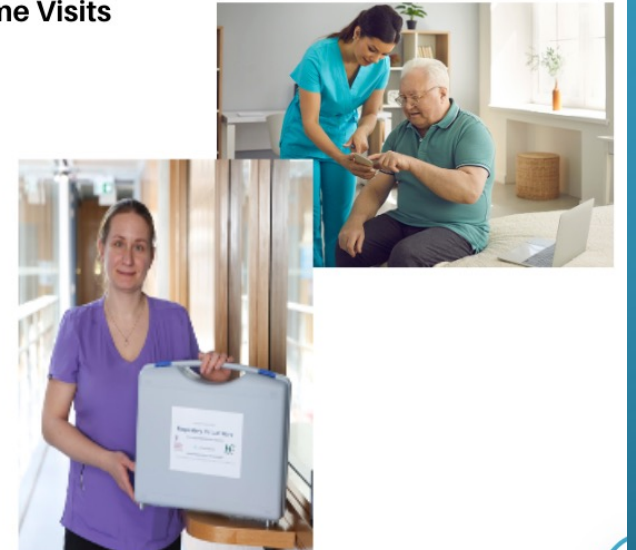
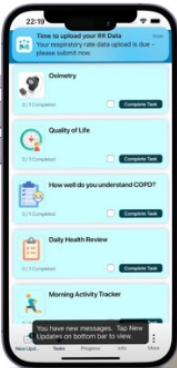


Remote Clinics or Home Visits



Chronic Disease Management/Self Management/Proactive Programs/PIR

Virtual Wards



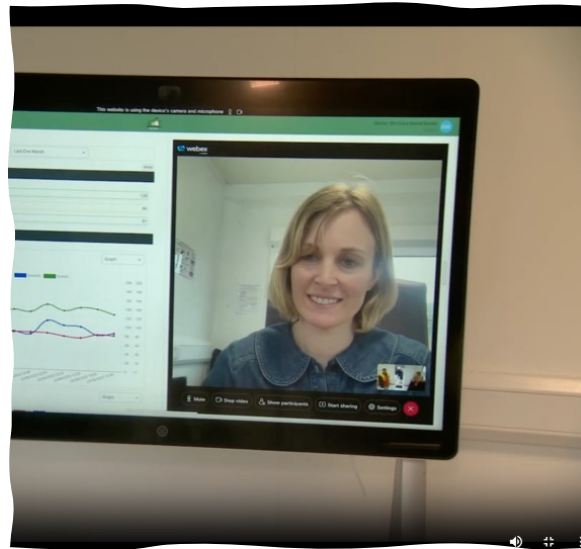
# Home Health Clare Island - > Healthy Islands

- 3 miles from mainland
- 165 residents
- 1 doctor (1 day/week)
- 2 nurses
- Aged 1 – 95
- Broad spectrum of health needs



# Clare Island Remote Care

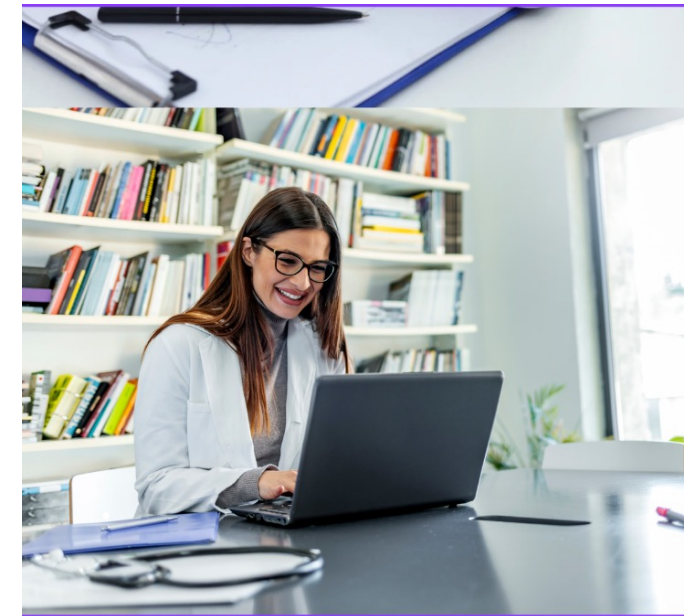
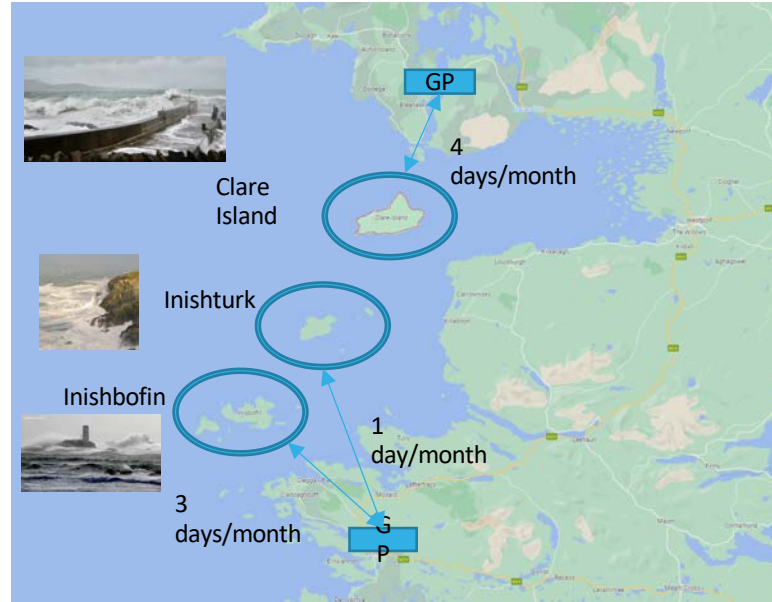
- Remote BP and FitBit
  - Seamless Webex Integration
  - Support Remote Consultant
  - Health Awareness
  - Drone Delivery/Robot
- 
- 8 new diagnoses of hypertension
  - 30 Remote Consultations



# Healthy Islands- Doctor can remain on the mainland

**Patient in island clinic – device  
data upload to myPatientSpace  
using Staff App.**

**Chronic Disease Management.**







myPatientSpace

**Thank You !**

**Come talk to us to learn more ...**



[info@myPatientSpace.com](mailto:info@myPatientSpace.com)

