



Fideicomiso de Salud
Pública de Puerto Rico



Un programa del
Fideicomiso para Ciencia,
Tecnología e Investigación
de Puerto Rico

Use of Technology in Puerto Rico Public Health Trust's Telemedicine Technology Enabled Learning Program

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Mission, Vision and Values

Mission

We invest, facilitate, and build capacity to continually advance Puerto Rico's economy and its citizens' well-being through innovation-driven **enterprises, science, technology,** and **public health.**

Vision

Puerto Rico is **globally recognized innovation hub.**

Values

Integrity. Entrepreneurial spirit . Collaboration. Leadership. Adaptability. Being a facilitator. Optimism. Respect. Customer focused. Achievement and results. Desire to innovate. Responsibility. Commitment.



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RESEARCH & DEVELOPMENT



ENTREPRENEURSHIP



PUBLIC HEALTH



FOUNDATION



Puerto Rico Public Health Trust

Vision

Achieve sustainable health equity in Puerto Rican communities and improve their quality of life through innovation, collaboration, and community engagement.

Mission

Serve as a trusted ally working with private and public partners to identify and execute community-led, evidence-based solutions.

Priorities

Health Equity and Social Determinants of Health

Mental and Behavioral Health

Climate Change

Chronic Diseases Prevention and Management

Emerging Public Health Issues

Emergency Preparedness and Response

Values

Equity

Excellence

Innovation

Social Justice

Collaboration

Inclusion

Integrity

Respect



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Our Divisions and Projects



Community Engagement

- Facilitates and builds strong relationships and collaboration between PRPHT and the communities we serve.
- Engage community leaders and members.
- Actively empowers communities to improve their health and well-being.



Environmental Health

- Provides environmental research, resources, education, evidence-based training, community engagement and technical assistance.
- Help communities to prepare for health impacts from climate change and for the stressors of emergencies and disasters in rural and underserved communities.



Social Epidemiology

- Creates awareness about the determinants of health, health disparities, and health equity.
- Provides data analysis and evaluation support for all PRPHT projects.
- Provides technical assistance and tools to improve public health workforce capacity and equity.



Environmental Health

Environmental Health

Aims to provide environmental research, resources, education, evidence-based training, community engagement and technical assistance.

200 Nursing homes
45 Rural Health Clinics
12 Non-PRASA Communities
5 Communities
Educational Leaders

Provide telemedicine equipment and training to improve health access and crisis management.

Increase capacity for the treatment of health and diseases using the ECHO approach, webinars, technical assistance

Investigate the cumulative health effects of drought in community-operated aqueducts.

Understand the effects of climate change on the health of our population.

Mental Health

Health Equity

Chronic Diseases

Emerging Public Health Issues

Emergency Preparedness



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Timeline



Long-Term Care Facilities

Seniors who get the coronavirus are at high risk of a severe impact.



Coronavirus Aid, Relief and Economic Security (CARES) Act



Health Clinics

Need to extend telemedicine in rural communities around the island



Puerto Rico Public Health Trust

Provide 32 telemedicine equipment to health clinics



Coronavirus Disease 2019 (COVID-19)



Health Clinics

Rapid growth in hospitalization and advanced respiratory support and difficulty getting an appointment.



Puerto Rico Public Health Trust

Provide 200 telemedicine equipment to LTCF and 13 telemedicine equipment to health clinics



DISTANCE LEARNING & TELEMEDICINE GRANT 2019 & 2020

U.S. DEPARTMENT OF AGRICULTURE (USDA)



Telemedicine Technology Enabled Learning Program

HEALTH RESOURCES & SERVICES ADMINISTRATION (HRSA)

Increase access to and quality of health care in rural PR and expand connections to medical specialists.



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TTELP Vision, Goal and Objectives

VISION: Current and unmet community healthcare needs will be addressed improving access to quality health services-resulting in enhanced population health and health equity.

GOAL: To connect specialists at academic medical centers with primary care providers in rural, and underserved populations, providing evidence-based training and support to help treat patients with complex conditions in their communities.

Objective 1:

During the next five years the project will foster interdisciplinary team-based approach to identify and address current and unmet community healthcare needs, improve access to quality health services, achieve health equity, and enhance population health.

Objective 2:

Forty-five (45) participating facilities in rural communities, 200 hogares, and por lo menos hasta ten (10) medical specialists from Academic Medical Centers in Puerto Rico will have a signed collaborative agreements and participate in the ECHO learning community collaborative model

Objective 3:

During the project, stakeholders will participate in ECHO monthly education and training sessions to learn about ECHO methodology, roles, responsibilities, and expected outcomes on how to adhere and share best practices regarding specialty care at primary care level.

Objective 4:

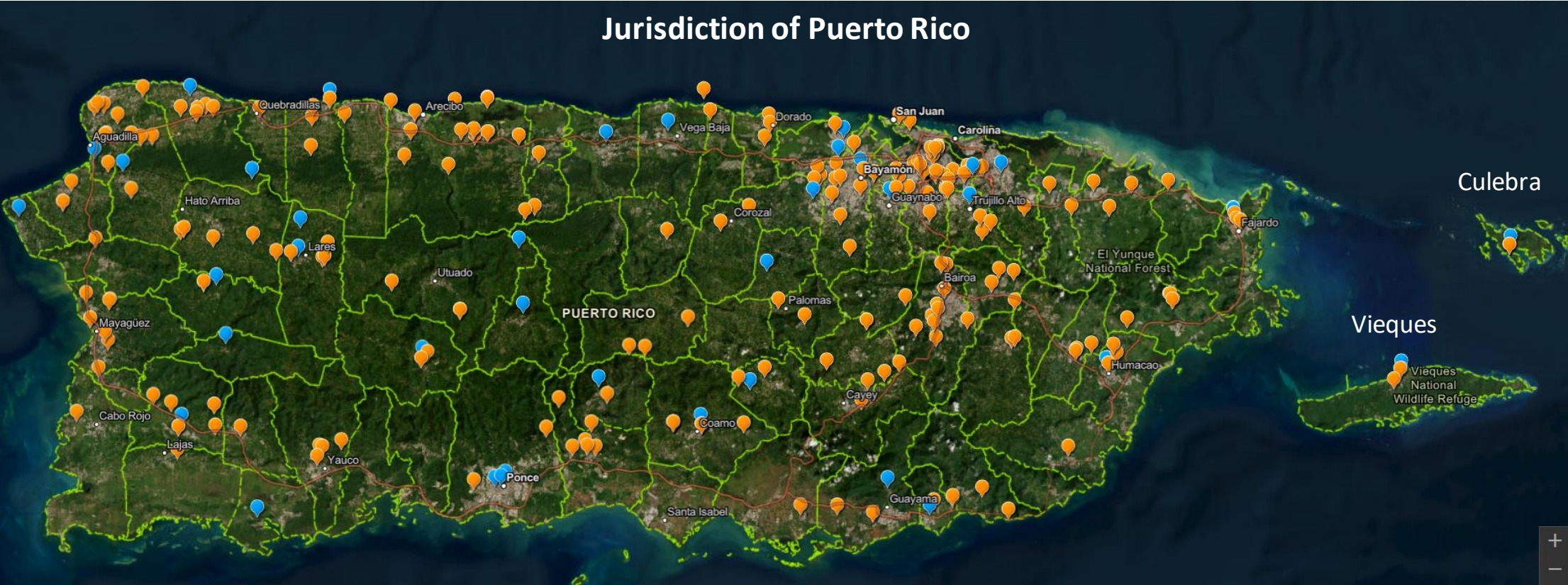
After completing ECHO trainings, stakeholders will be able to identify, discuss, expand current knowledge, and develop skills in evaluation and management of infectious diseases, such as COVID-19, including COVID-19 “long haulers”, and chronic diseases (heart disease, chronic lung disease, diabetes, multiple sclerosis, etc.).

Objective 5:

During the next five years, the TTELP project will provide a Digital Library with freely accessible tools and resources to address chronic conditions management at community level of care.



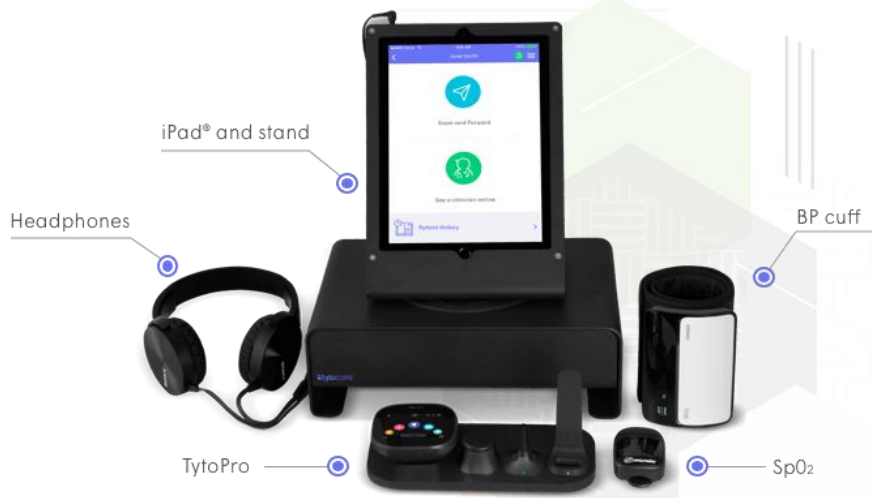
Spoke Sites and locations of telemedicine equipment in community clinics and long-term care facilities



Nursing Homes & Long-term Care Facilities – orange (200)
Community Clinics – blue (45)



TytoCare telemedicine equipment



Training of health care professionals in nursing homes, educational series (ECHO model), development of instructional guides and videos.



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GlobalMed telemedicine equipment



Recibe Gratis equipos de conferencia

SAMSUNG

hp

ATENCIÓN: A TODOS LOS CENTROS DE SALUD

Adquiere tus equipos y facilita la conexión a series educativas y el acceso a la salud de tus pacientes

Equipos*

- Televisor: Samsung Be 75T-HP Pro
- Laptop: HP 17.3" Flagship
- Cámara 360°: Meeting Owl Pro VCS

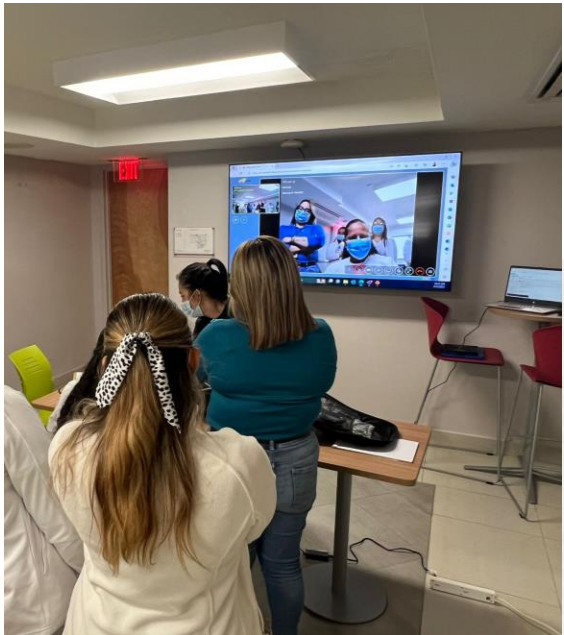
Requisitos

- Compromiso de participación en las sesiones educativas a distancia, con un mínimo de dos (2) profesionales

Beneficios

- Capacitación y aprendizaje de los profesionales de salud, ampliando el acceso a la atención de los pacientes.
- Formar parte de una comunidad de aprendizaje mutuo para mejorar la práctica y los servicios en los centros de salud; lo que aumenta la satisfacción personal y disminuye el aislamiento profesional.

Más información



Training of health care professionals in nursing homes, educational series (ECHO model), development of instructional guides and videos.



Project ECHO *(Extension for Community Health Outcomes)*

Connect academic medical specialists/experts with primary care providers in rural populations:

- Brief didactics
- Best practices
- Case based learning
- Peer-peer sharing

Satisfaction metrics

Knowledge metrics

Need assessment

Metrics of confidence and self-efficacy

Behavior metrics

ECHO Model

“ALL TEACH, ALL LEARN”



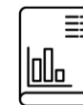
Use Technology to Leverage Scarce Resources



Share Best Practices to Reduce Disparity



Case-based Learning to Master Complexity



Evaluate and Monitor Outcomes



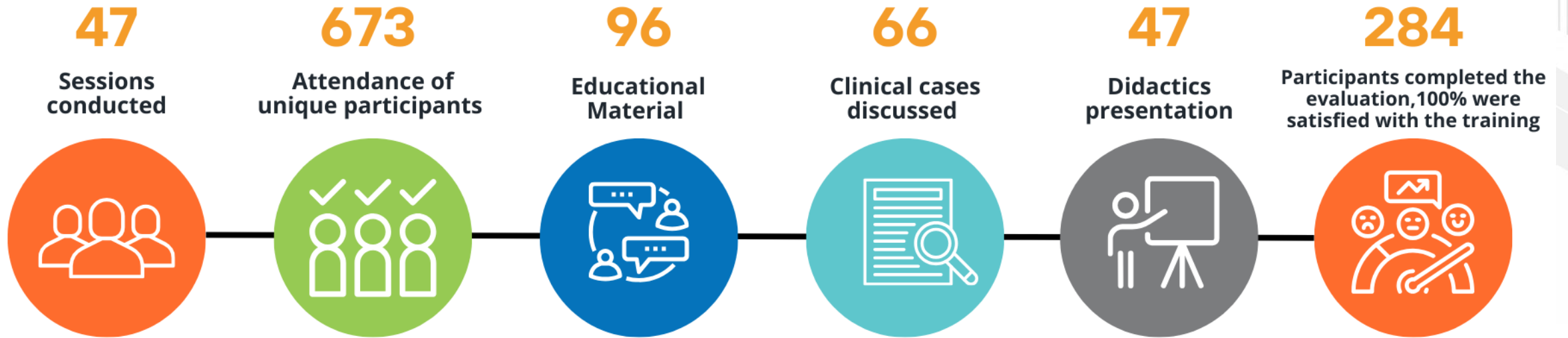
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Project ECHO *(Extension for Community Health Outcomes)*



Topics

- Long-Covid
- Management of the population with opioid use and abuse
- Management of chronic conditions at the primary level
- Adapting Telemedicine to the needs of Nursing Homes
- Diabetes Mellitus



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Project ECHO *(Extension for Community Health Outcomes)*

LONG-COVID

357

Attendance of unique participants

5 Didactics

4 Clinical Cases

5 Resources

79 Satisfaction

MANAGEMENT OF THE POPULATION WITH OPIOID USE AND ABUSE

88

Attendance of unique participants

5 Didactics

5 Clinical Cases

33 Resources

40 Satisfaction

MANAGEMENT OF CHRONIC CONDITIONS AT THE PRIMARY LEVEL

81

Attendance of unique participants

11 Didactics

20 Clinical Cases

31 Resources

70 Satisfaction

ADAPTING TELEMEDICINE TO THE NEEDS OF NURSING HOMES

61

Attendance of unique participants

6 Didactics

9 Clinical Cases

6 Resources

41 Satisfaction

DIABETES MELLITUS

86

Attendance of unique participants

20 Didactics

28 Clinical Cases

21 Resources

54 Satisfaction

60 Physicians obtained CME

“ It provides us with relevant information to improve our medical practice and patient care. In addition it exposes us to new and improved clinical experiences/techniques and new colleagues in our field. ”

“ The methodology is excellent because we do not have to travel to distant places. The presenter has demonstrated total knowledge and domain of the topics. He knows how to transmit to the audience, how we can manage the updated conditions and how to educate the patient to learn how to manage their conditions. ”



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Project ECHO *(Extension for Community Health Outcomes)*

ECHO Serie Salud Mental:

El Uso de Telemedicina y Telementoría para Mejorar el Acceso y Calidad de Servicios en Áreas Rurales de Puerto Rico dirigido a Profesionales de la Salud

Fecha de inicio: 25 enero 2024

Frecuencia: todos los jueves por 15 sesiones

Hora: 3:00PM - 4:30PM

Audiencia: Profesionales de la Salud

Registro: <https://bit.ly/RegistroECHOserieSaludMental>



TEMAS:

- ❑ Cuidarnos para cuidar: Estrategias de manejo de estrés dirigido a cuidadores La prevención del suicidio en adultos mayores
- ❑ La depresión en adultos mayores. Mitos y realidades sobre la vejez
- ❑ Resumir la evidencia científica apoyando el uso de telesalud con diversas poblaciones y presentaciones clínicas, con un enfoque en poblaciones adultas
- ❑ Destacar consideraciones prácticas en la implementación de telesalud con adultos incluyendo



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Hybrid Conference on billing process for telemedicine services targeting physicians (Center for Medicare y Medicaid Services (CMS))

90

Attendance of unique participants



4

Educational Material



58

Participants completed the evaluation, 100% were satisfied with the training



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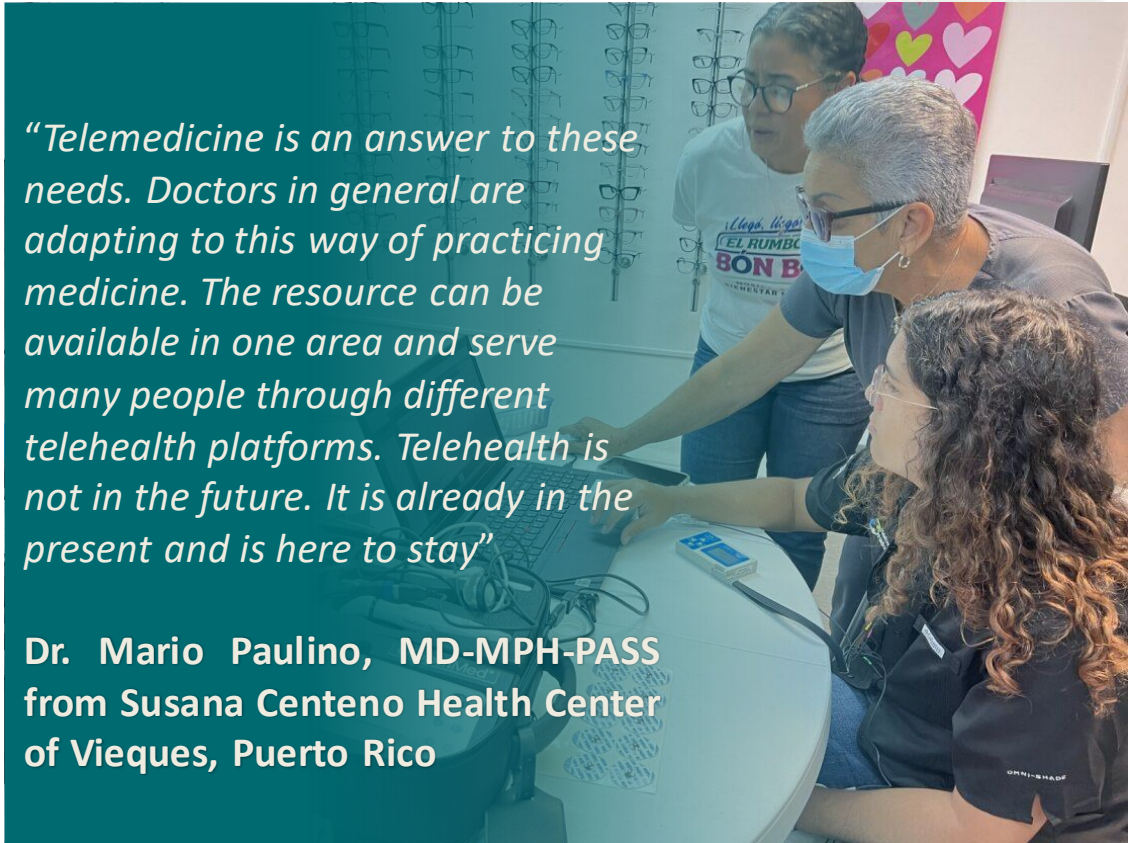
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Training, engagement and technical assistance to primary health care clinics

64 training site visits have been conducted at health centers impacting **165** healthcare professionals.

20 engagement visits have been conducted to keep them aware of the tools, resources, educational sessions, training, and technical assistance available and developed by the project.

39 technical assistance received and completed



“Telemedicine is an answer to these needs. Doctors in general are adapting to this way of practicing medicine. The resource can be available in one area and serve many people through different telehealth platforms. Telehealth is not in the future. It is already in the present and is here to stay”

Dr. Mario Paulino, MD-MPH-PASS
from Susana Centeno Health Center
of Vieques, Puerto Rico



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Training and technical assistance to LTCF

199 training site visits have been conducted at long-term care facilities impacting **396** healthcare professionals.

80 technical assistance visits have been conducted



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Resources for health care clinics

14 Development of instructional on-Demand videos



2 user guides and were developed about how to use the equipment and software.

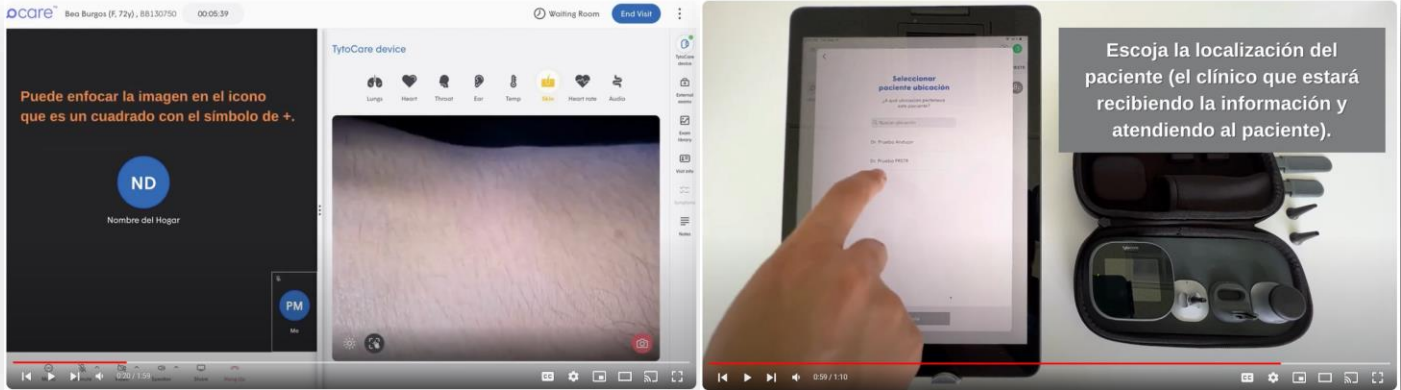


Resources for long term care facilities

9 on-demand instructional videos for long-term care facilities

10 on-demand instructional videos for physician

2 instructional guides for long-term care facilities and physicians



Directory of healthcare professionals using telemedicine *in process*

146 physicians have registered.

133 is interested in receiving telemedicine training on different platforms.

52 of them have telemedicine certification.

21 different medical specialties.



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Digital library: <https://recursos.prpht.org>

196 resources shared by subject matter experts

9 types of resources

8 different topics



Temas
Selecciona los temas para filtrar los recursos

- Actividad física
- Alcoholismo
- Condiciones crónicas
- Diabetes
- Drogas
- Enfermedades cardiovasculares
- Enfermedades del sistema musculoesquelético
- Neurofarmacología

Tipo de Recurso
Selecciona los tipos de recursos que deseas visualizar

- Análisis de datos
- Artículo científico
- Estudio de caso
- Guía
- Herramienta
- Infográfico
- Libro
- Recomendación de libro
- Recurso educativo

Filtrar recursos... Mostrando 58 de 181

 Diabetes Diabetes Mellitus: Complicaciones agudas de la Diabetes Mellitus % Diabetes % Video % Español 7 de diciembre de 2023 Ver Recurso →	 Diabetes Caso clínico (1): Sesión 10 - Objetivos de control, plan de cuidado y monitoreo en pacientes con Diabetes Mellitus % Diabetes % Estudio de caso % Español 7 de diciembre de 2023 Ver Recurso →	 Diabetes Caso clínico (1): Sesión 11 - Complicaciones Macrovasculares: Diabetes Mellitus y riesgo cardiovascular. % Diabetes % Estudio de caso % Español 7 de diciembre de 2023 Ver Recurso →	 Diabetes Carbohydrate Counting for People with Diabetes % Diabetes % Guía % English 7 de diciembre de 2023 Ver Recurso →
 Diabetes AAACE/ACE Consensus Statement_Type 2 diabetes_January 2020 % Diabetes % Artículo científico % English 7 de diciembre de 2023 Ver Recurso →	 Diabetes Glycemic Targets Standard of Care in Diabetes 2023 % Diabetes % Artículo científico % English 7 de diciembre de 2023 Ver Recurso →	 Salud mental Cuestionario sobre la salud del paciente 9 (PHQ-9) % Salud mental % Herramienta % Español 7 de diciembre de 2023 Ver Recurso →	 Salud mental Trastorno General de Ansiedad GAD-7 % Salud mental % Herramienta % Español 7 de diciembre de 2023 Ver Recurso →



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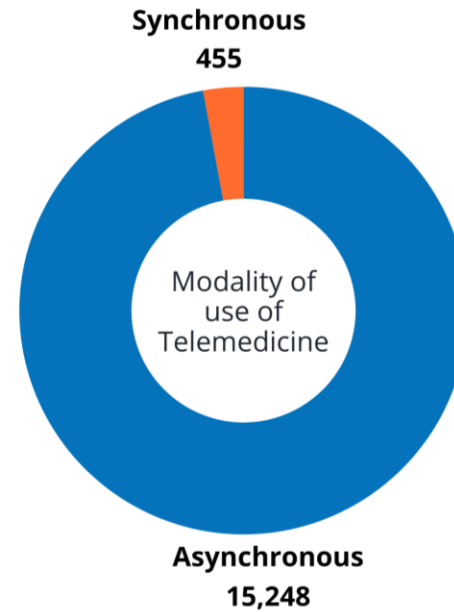
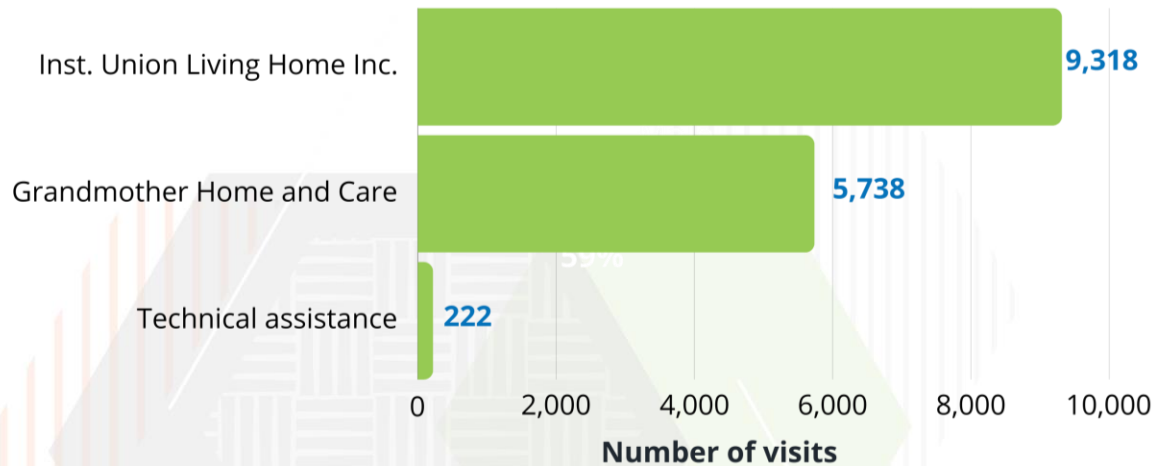
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Equipment Use Data/Metrics

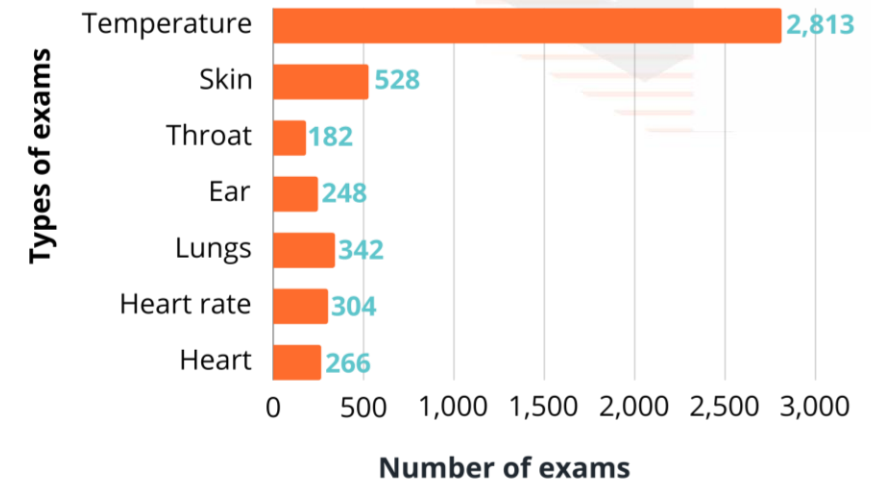
TytoCare (LTCF's n=200)

GlobalMed (Clinics n=45)

Number of visit performed by the most LTCFs using telemedicine equipment



Exams performed by the Nursing Home



Testimonials from champions



 **KAPWING**



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Next steps



Committed to existing spokes sites:
200 LTCF's and
45 Community Clinics



Expanding our online library of resources



Continued needs assessments to
select themes for ECHO's, Webinar
s and Trainings



Participating in a regional telehealth
conference planned by SETRC in January,
2024 and OAT Grantees Meetings.



Continue ECHO Series



Continued strategization on how spoke
sites can pay for their equipment platform
subscriptions



Continued provision of educational
resources



Continued strategization on how to obtain
timely use data



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Thanks

