

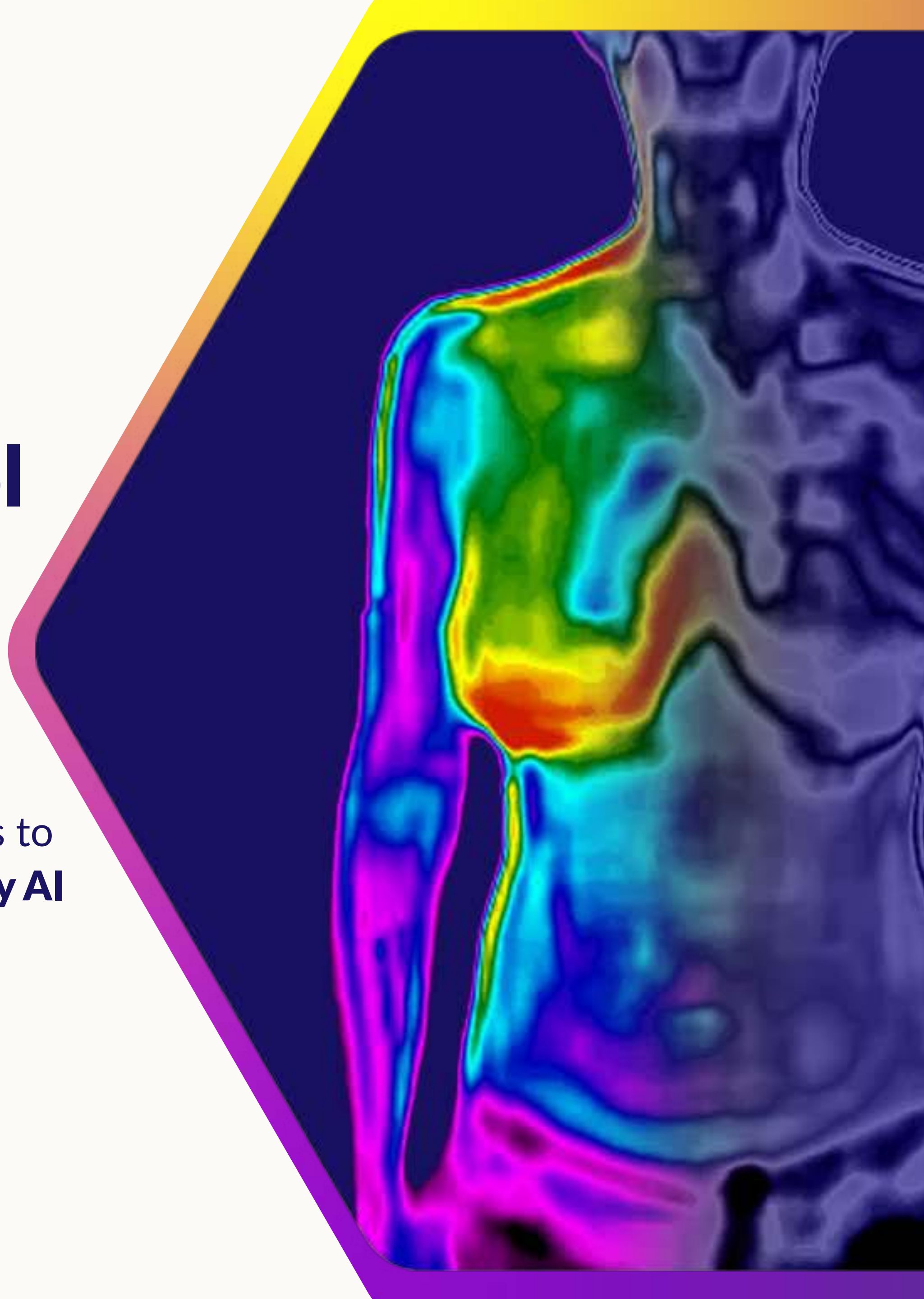


Developing AI-oriented digital tool for screening & monitoring of early stage breast cancer

Partnering with Novartis Oncology, MORE-Darzalas and multiple HCP's to
reduce breast cancer undercare via personalized mobile thermography AI

kelvin.health | info@kelvin.health

October, 2021



The Breast Cancer Pandemic

1 in 8

women will develop
invasive breast cancer in the
course of her lifetime

2.3M

newly diagnosed
and 685K deaths globally in 2020

7.8M

alive who were
diagnosed in the past 5 years



In Practice

502M

would benefit from
regular screening to increase
chances of early detection

650K

lives can be saved
annually thanks to early detection
at Stage I before metastasis

31M

mammograms / year
need to be examined currently
when monitoring the survivors

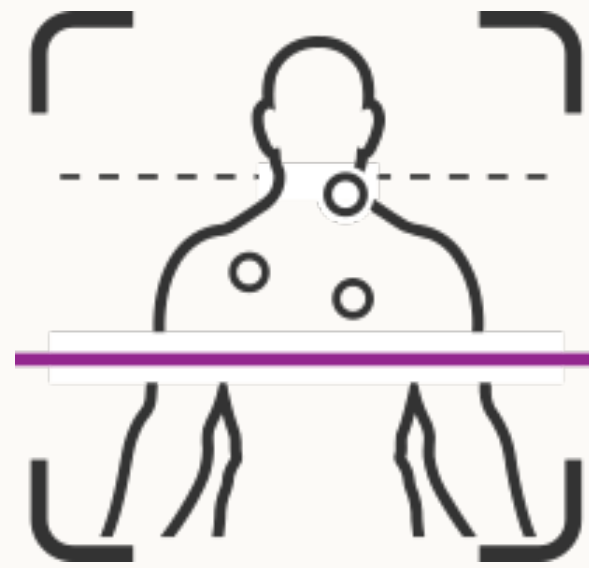


Kelvin Health's Mobile Thermography



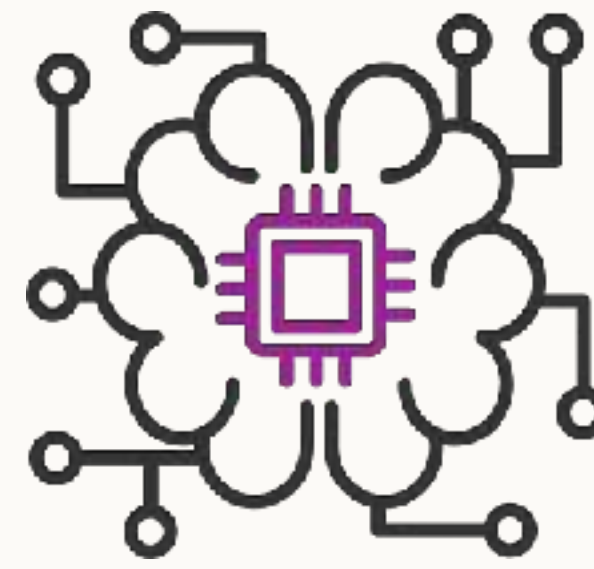
Mobile Thermocamera

Captures the heat emitted by the body



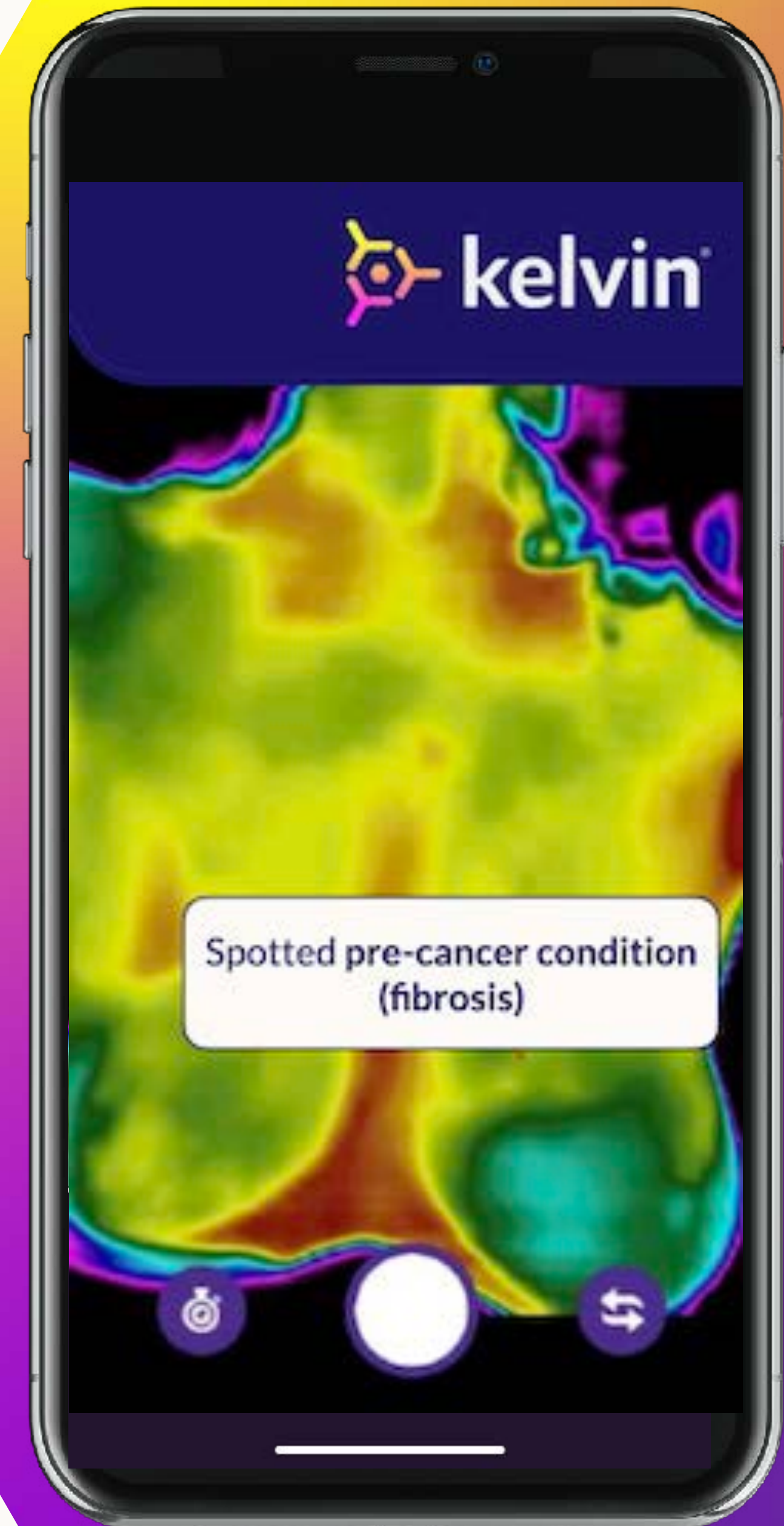
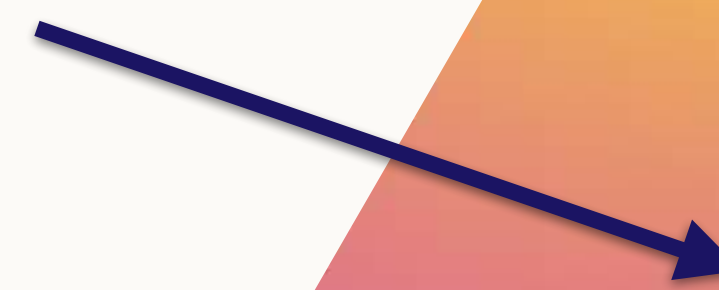
Thermal Segmentation

Proprietary segmentation of the thermal image



AI Analysis

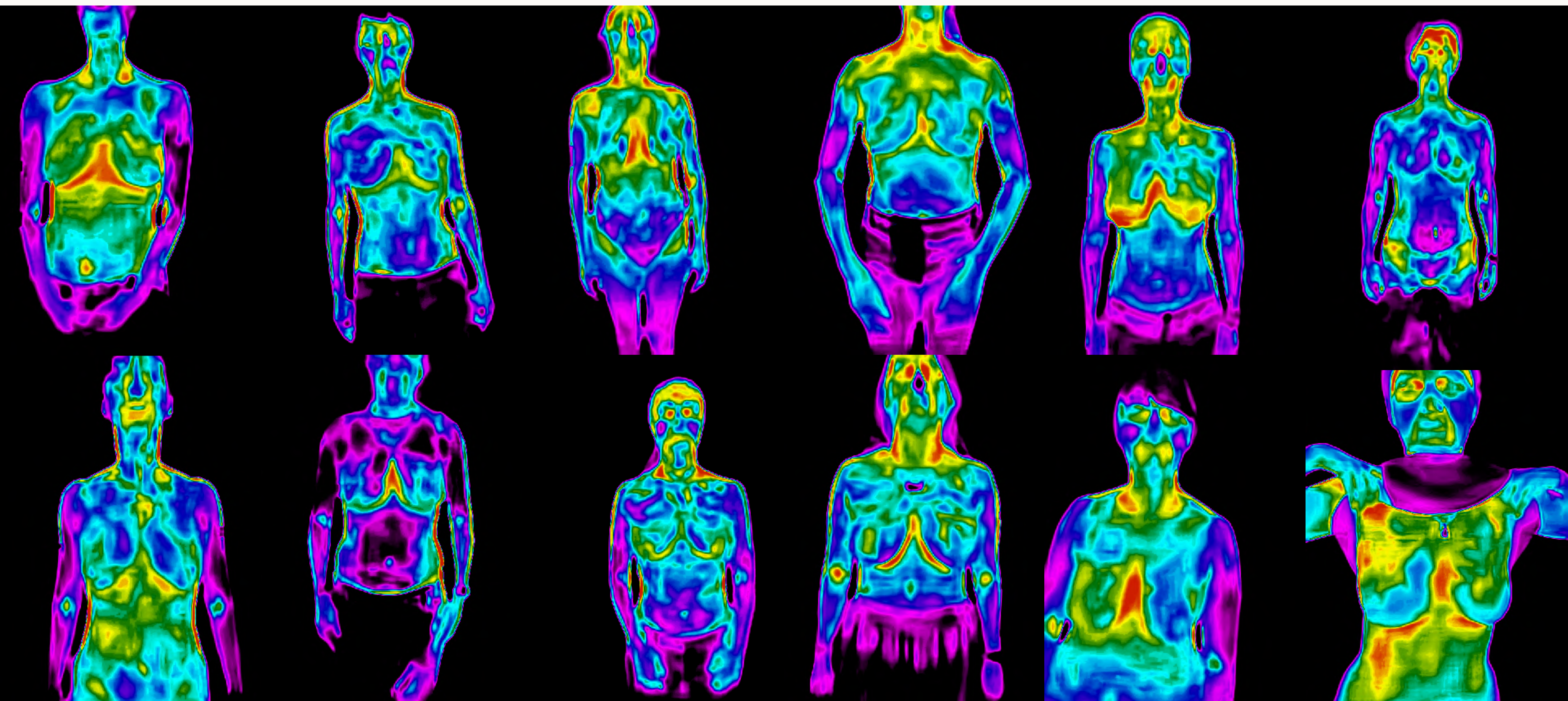
Machine-learning based detection of anomalies



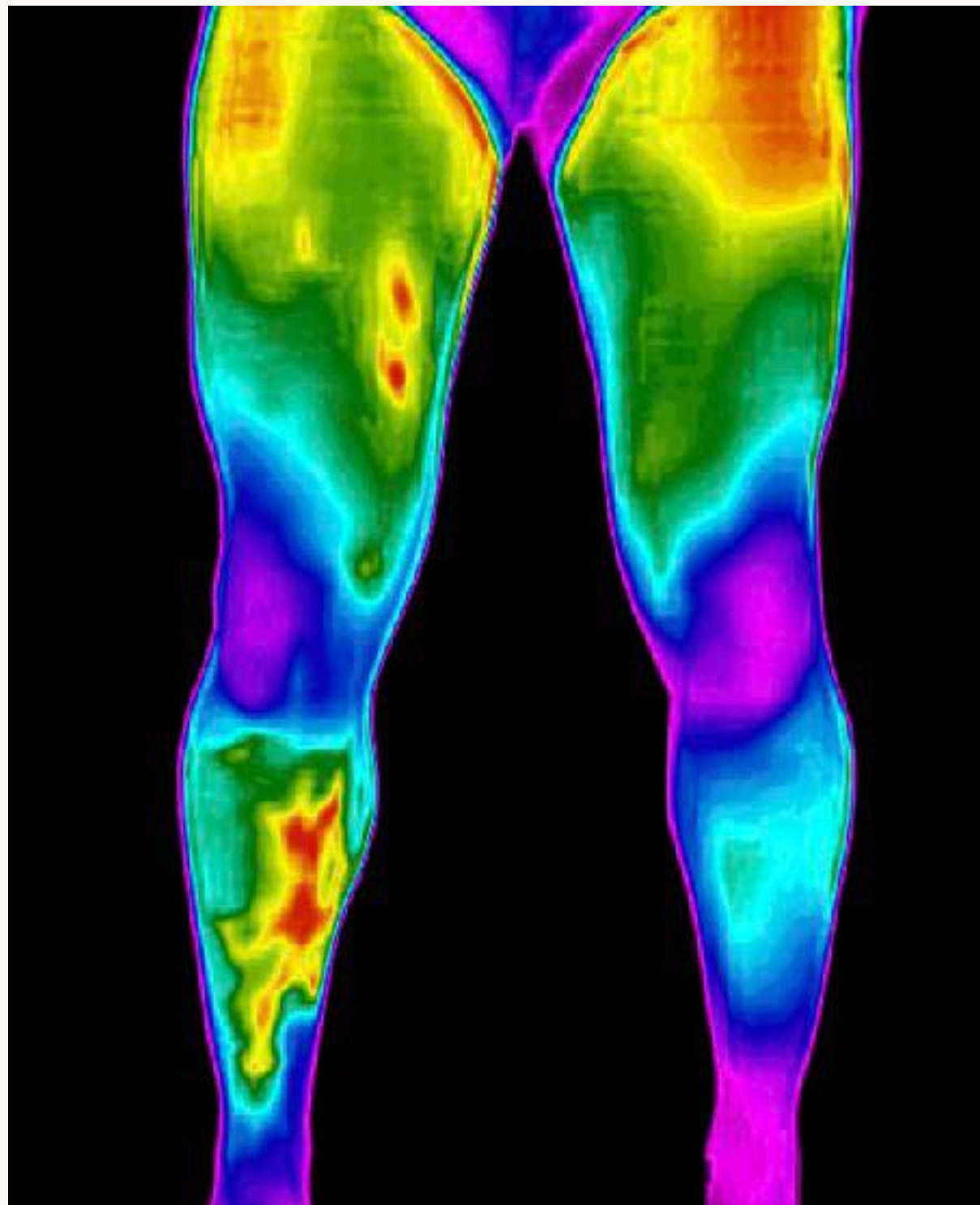
Compared to existing screening & monitoring approaches this one is:

- ✓ Widely accessible and personalized
- ✓ Appropriate for frequent application, even to pregnant women
- ✓ Applicable to dense breast tissue (as in younger women)
- ✓ Portable and allowing remote self-application initially
- ✓ Causing minimal physical, logistical, and financial discomfort

Some of Our Screening Samples

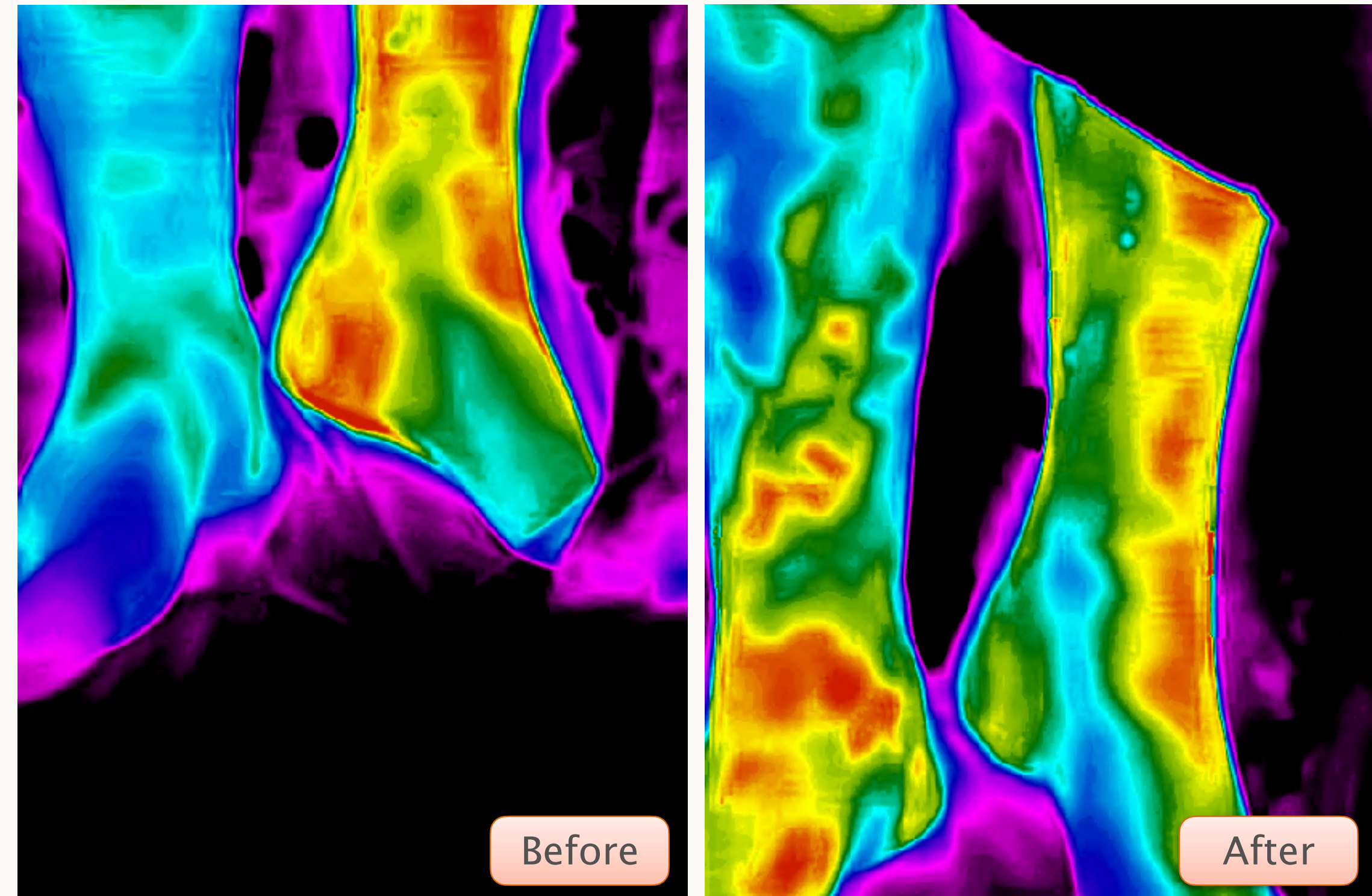


Another Major Application - CVD Care



Thrombophlebitis / VTE / DVT
Screening & Monitoring

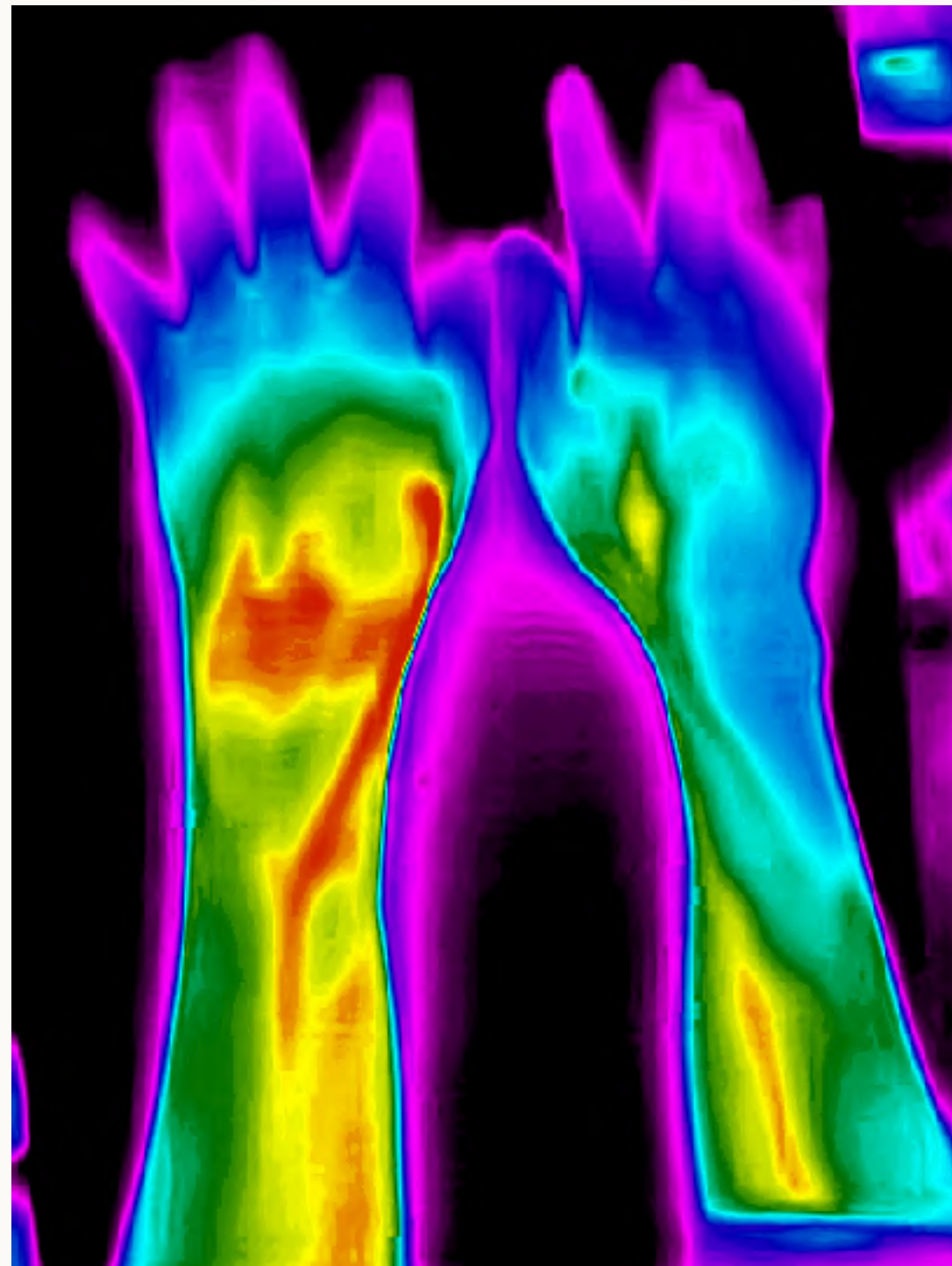
(10M+ people worldwide suffering VTE)



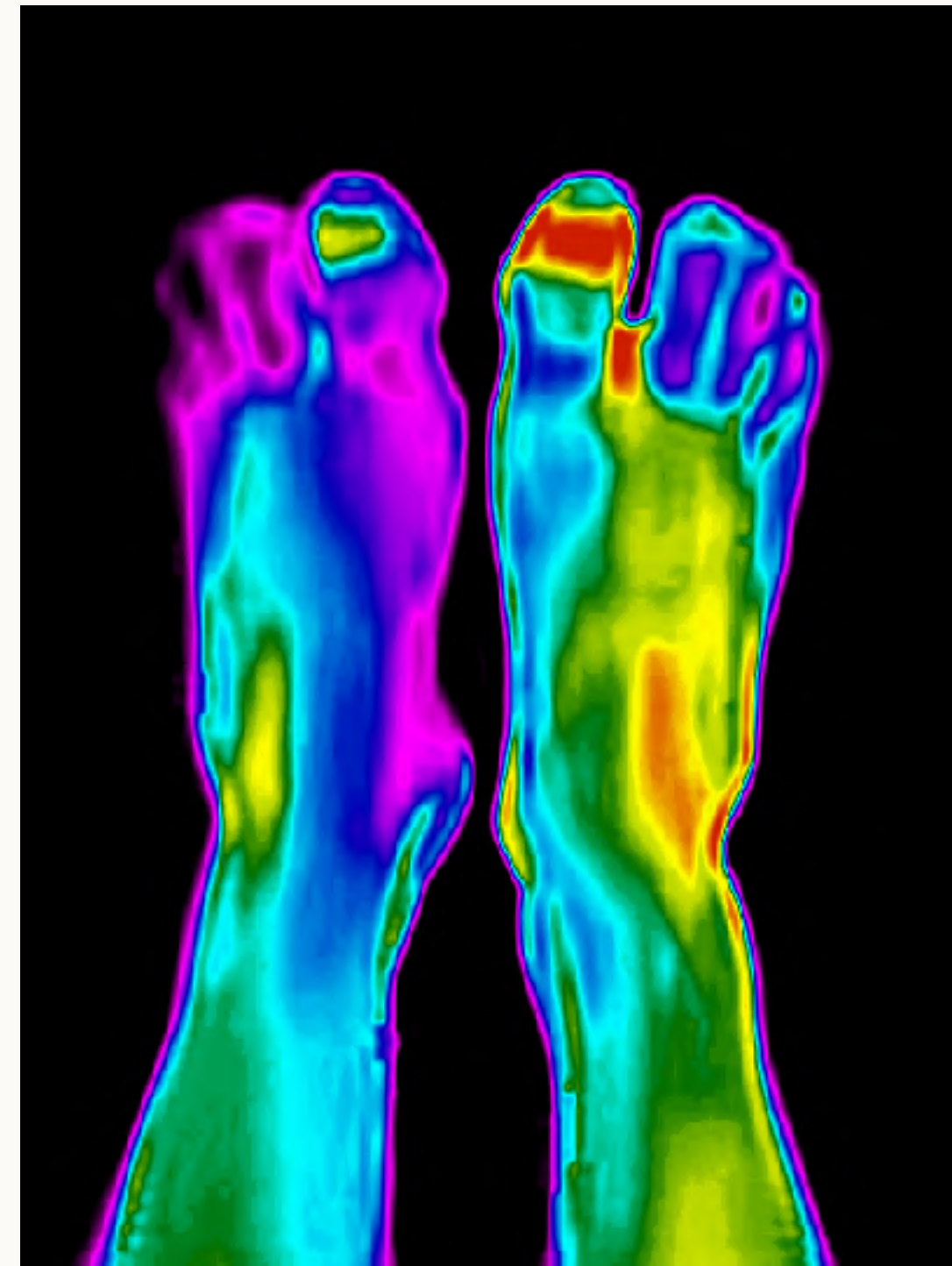
PVD / PAD
Screening & Treatment Effect Monitoring

(200M+ people worldwide suffering PAD)

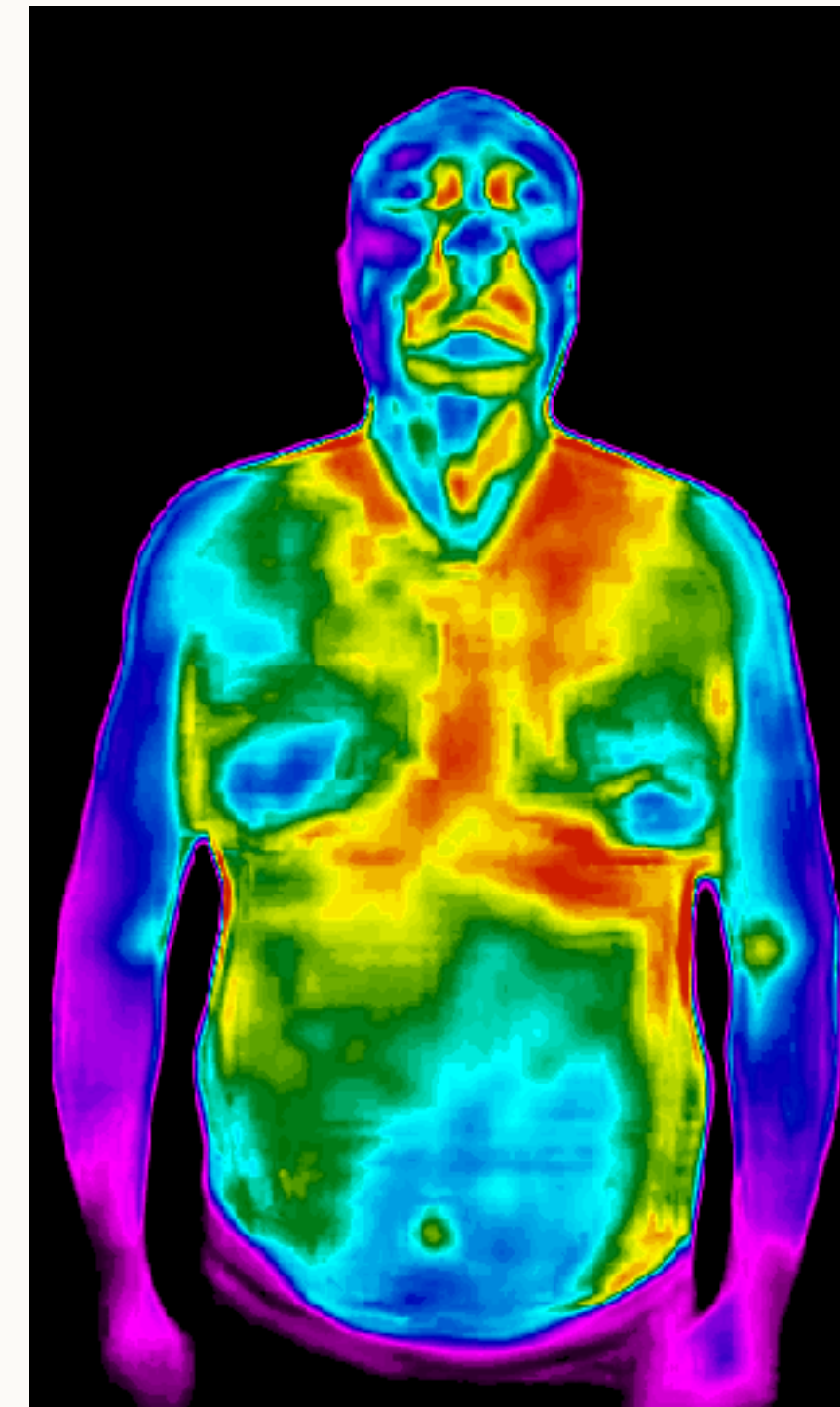
Even More Potential Applications



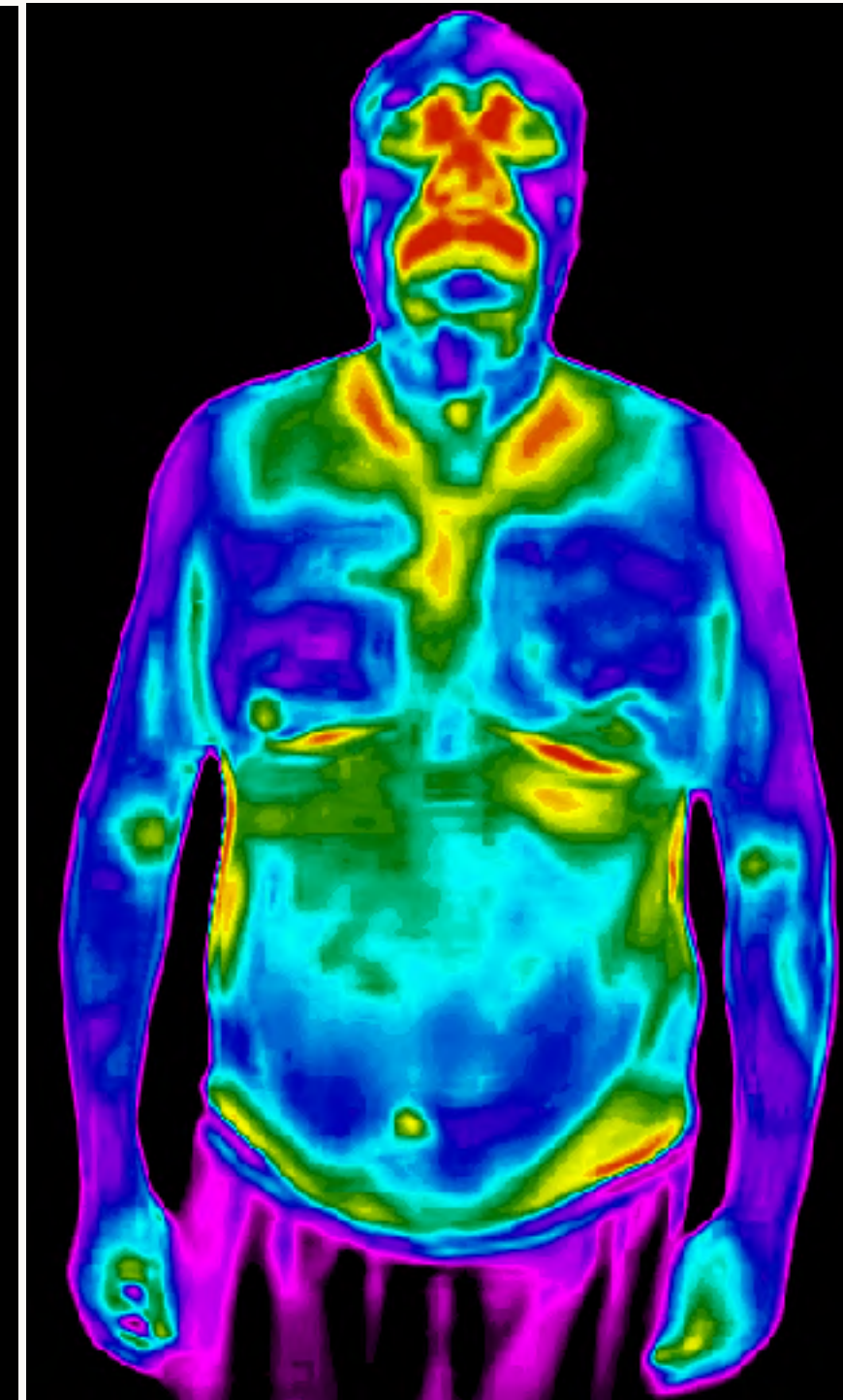
Rheumatoid Arthritis
(autoimmune inflamantons)



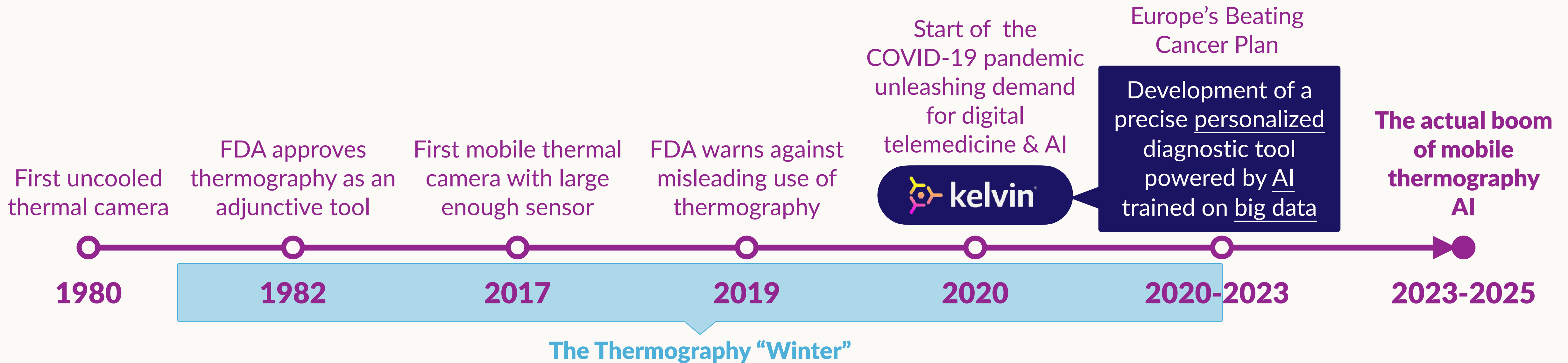
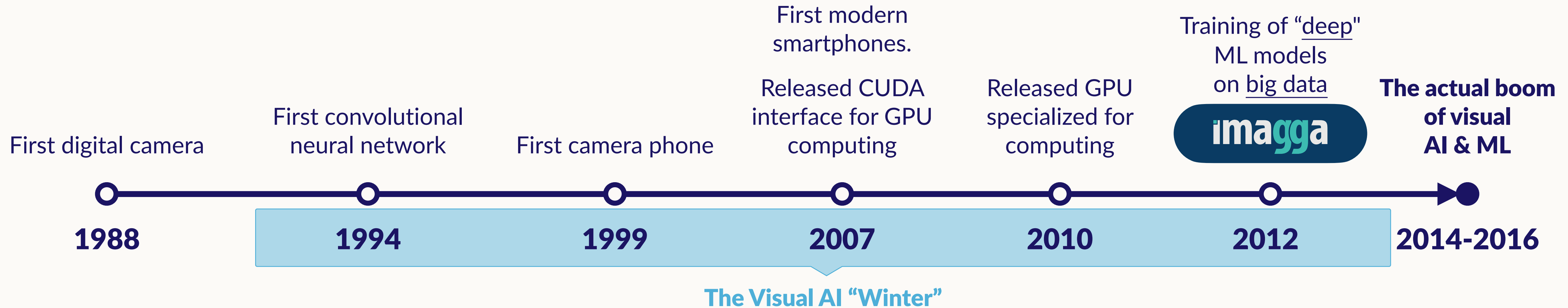
Traumatology
(in ER context)



COVID-19
(respiratory infections monitoring)



Why (Mobile AI) Thermography Now?



Value Prop to Consumers & Payers

Enabling screening in the comfort of your home or local primary care hub:

- ✔ **Less** psychological and financial **stress**
- ✔ **Less** exposure to **radiation**
- ✔ More **convenient logistics**
- ✔ More **frequent and personalized** screening
- ✔ Ultimately, **better health outcomes** and **significant cost savings** thanks to earlier detection of eventual problems.



Treatment Costs for Breast Cancer

Costs allowed per patient in the 24 months after the index diagnosis:

Stage 0: \$71,909

Stage I/II: \$97,066

Stage III: \$159,442

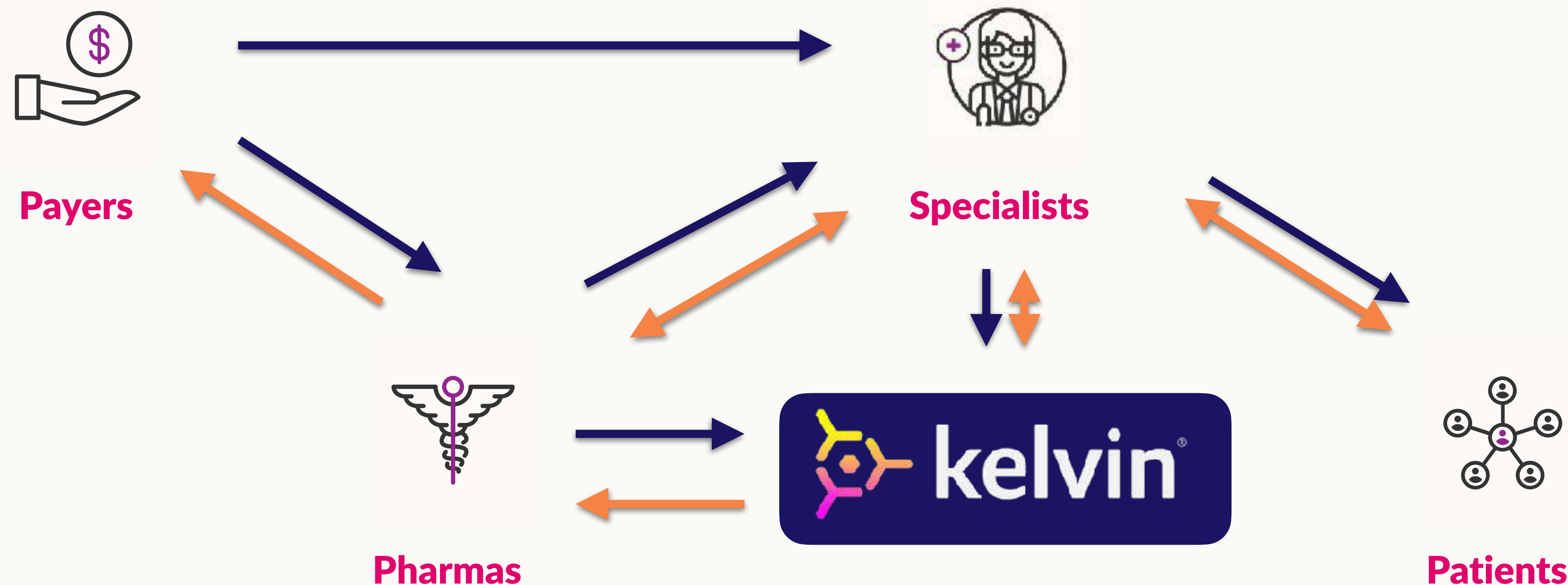
Stage IV: \$182,655

Knowledge of the relevant stage-specific cost data provides support for programs, such as breast cancer screening, that are designed to shift diagnosis to earlier disease stages.

Market Access Value Prop to Pharma

Enabling wider market access to breast cancer patients, as:

- ✔ **More patients** will be diagnosed early and enter the patient journey;
- ✔ Ineffective treatment will be detected earlier, investigated and adjusted properly **without the need to switch the patient therapy off**;
- ✔ The demographic segments that respond best to the therapy will be identified, making it a **preferred choice of payers** (insurers, national health systems).

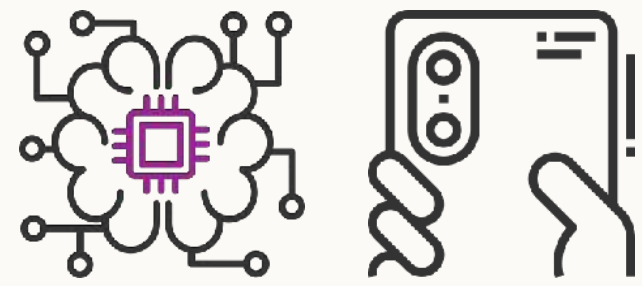


“The Kelvin Health projected solution in Oncology would add tremendous value to the level of our services by providing new disruptive, quickly and easily accessible technology solution supporting processes for improvement of health status in oncology care.”

– Iwaylo Petrov
Innovation & Transformation Central
Eastern Europe Lead,
Market Access Lead - Novartis Oncology

→ Workflow
→ Dataflow

Current Progress



Technology Implementations:

Machine Learning and Software Backend

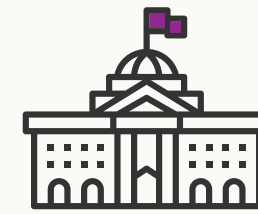
Toolchains and infrastructure properly set up

Mobile Application For Thermal Data Collection

Currently working with iOS and Flir One Pro thermal camera

Evaluation of OEM Thermal Hardware Options

Specification and planning of collaboration with vendors



Regulatory Approvals:

Ministry of Health

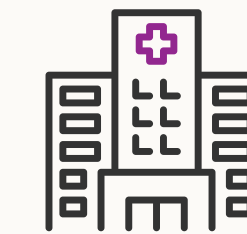
Thermography research clearance

Data Protection Agency

Thermography data clearance

Drug Agency

Cancer research clearance (in progress)



HCP's R&D Collaborations:

University Clinical Centre Maribor

Screening for Breast Cancer in Slovenia

1st GH "St. Sofia"

Screening for Breast Cancer in Bulgaria



Pharmaceutical R&D Collaborations:



Novartis Oncology Region Europe / BIOME Innovation Lab

Research collaboration projects

Winner of Novartis Oncology Global Challenge "Braking Barriers" '21



Cancer Research R&D Collaborations:



MORE-Darzalas Foundation

Mass screening for Breast Cancer in Bulgaria

"We are already in partnership with Kelvin Health Inc. in MVP phase of concept in Breast Cancer diagnostic together with Novartis Region Europe Medical department and "Darzalas" Foundation testing healthcare solutions to our customers. We work on strategic project in oncology in order to develop and implement e-health and telemonitoring solutions in European healthcare system."



— Ivaylo Petrov

Innovation & Transformation Central Eastern Europe Lead,
Market Access Lead - Novartis Oncology

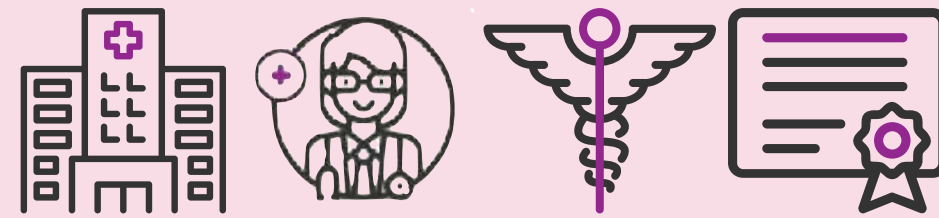
Next Steps

R&D Phase

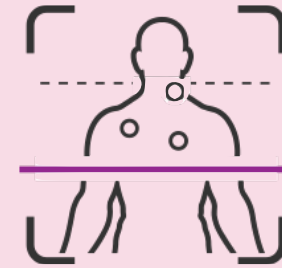
600 patients
Mammography
BI-RADS



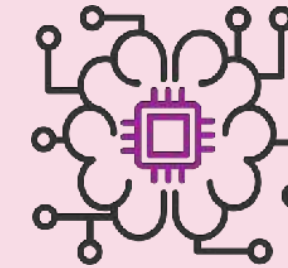
24 more research
partnerships for data
collection



187K samples from
47K sessions
with 6K patients



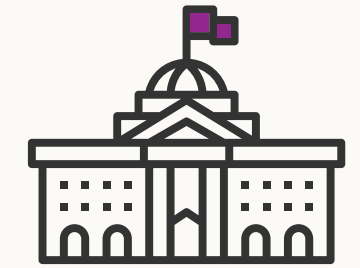
Training ML models
with >95% specificity
and sensitivity



Prototype of a custom
thermal camera specific
to the human body



Regulatory approval
process started for both
software and hardware



R&D:

Month 12

Month 15

Month 18

Month 20-24

Month 25

Month 27

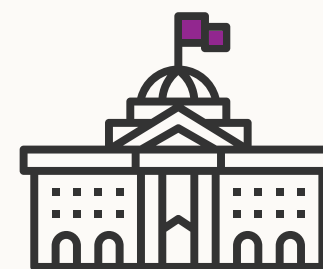
Month 32-38

GTM:

Growth >>



Custom thermal
camera ready for
manufacturing



Regulatory
approvals
granted



Pharma
commercialization with
regional market access
teams



Expansion to US,
Germany and global
market access teams

Commercialization Phase

Unique Opportunity

AI/ML

team experience

pioneers in image recognition,
processed >26B generic images

Data

unique thermal set

will be created in an accessible
regulatory environment (CEE)

Trend

preventive medicine

that is personalized, precise, rapid,
and using the wave of telemedicine
and global fight against cancer





We believe that a true Unicorn should positively impact the lives of 1B+ people. That's why we are working relentlessly to help preventing the suffering of half billion women and their families.

We would love to have you as a partner on this journey in case we share the same values!

kelvin.health | info@kelvin.health

October, 2021

