

# TIHM for COVID

Keeping people with dementia out of care homes



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with Alan, Howz customer

Crown  
Commercial  
Service  
Supplier

howz

# Data sources

## Smart Home



Hub



Socket (+ range extender)



Motion, temp, light



Door, temp



Button



Vibration, temp



Smoke

Many other devices available e.g. RFID, keypad flood, humidity, CO

## Smart Meter



Electricity



Water

## Mobile device



## Medical devices



Pulse Oximeter



Thermometer



Scales



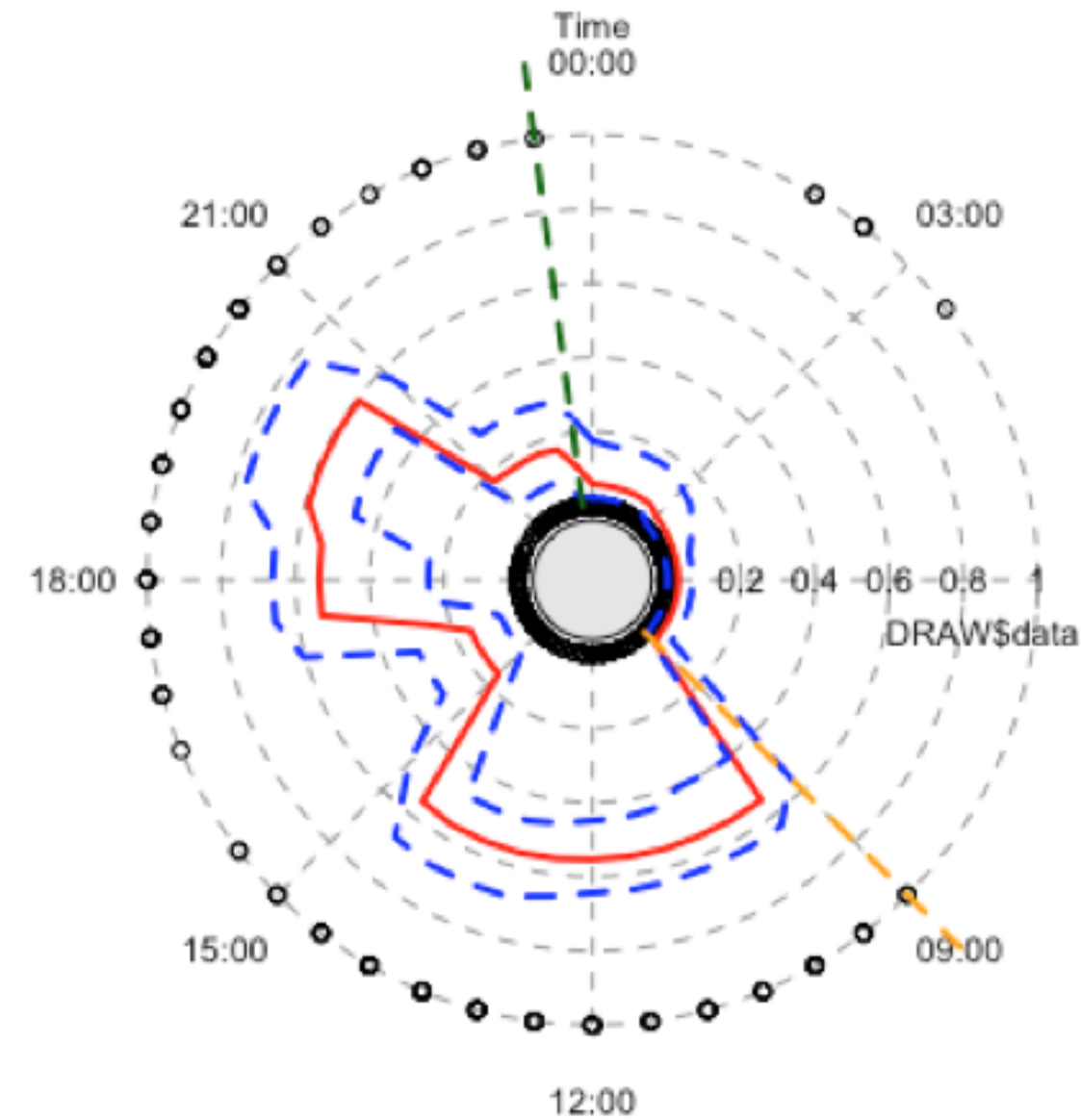
Blood Pressure

# Using machine learning to detect anomalies

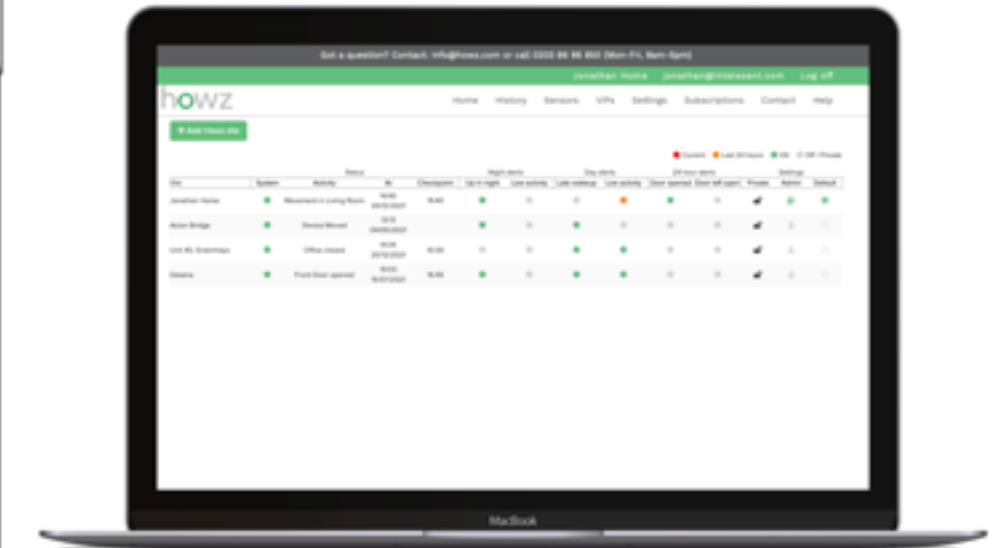
- 1 In first 7 days find start and end of day, activity during day; and update weekly thereafter



- 2 Model gives statistical basis to send alerts based on customer's sensitivity



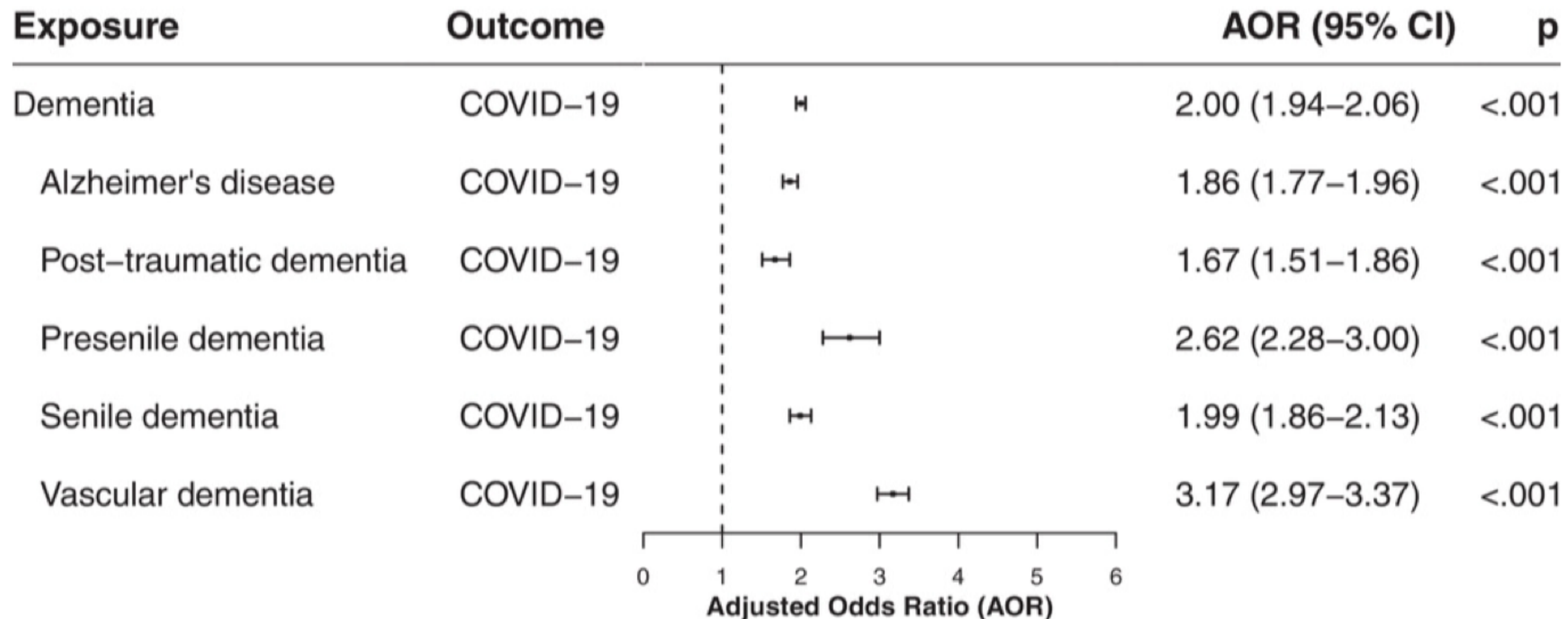
- 3 Send alert that Mum is not as we would expect her to be



No need for manual settings – works 'out of the box'

# COVID risk doubles for people with dementia

Odds of COVID-19 in patients with dementia  
(adjusted for demographics and known COVID-19 risk factors)



Reference: Wang Q, et al. [COVID-19 and dementia: Analyses of risk, disparity, and outcomes from electronic health records in the US](#). Alzheimer's & Dementia. 2021, Feb 9. doi: 10.1002/alz.12296.

# TIHM for COVID



# Outcomes of TiHM for Covid

AHSN Independent economic assessment of outcomes over 12 months

## SOCIAL OUTCOMES



Reduction in risk of care home admission due to TiHM



of TiHM users feel less anxious since joining the service



70kg of CO<sub>2</sub>e emissions saved per TiHM user per year

## PATIENT OUTCOMES



Reduction in ambulance callouts



Reduction in emergency admissions



Reduction in inpatient stays in hospital



Reduction in attendees requiring no treatment

## ECONOMIC OUTCOMES



Positive impact on overall cost of care



Potential gross savings to local authority over 5 yrs by reducing care home placements



5 year return on investment for every £1 spent



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Thank you

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