


**The Actuarial Profession**  
making financial sense of the future

Life conference and exhibition 2010  
Kandyce Tester (CACI) & Matthew Edwards (Ernst & Young)



**Postcodes: Healthy,  
Wealthy & Wise?**

7-9 November 2010

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## Agenda

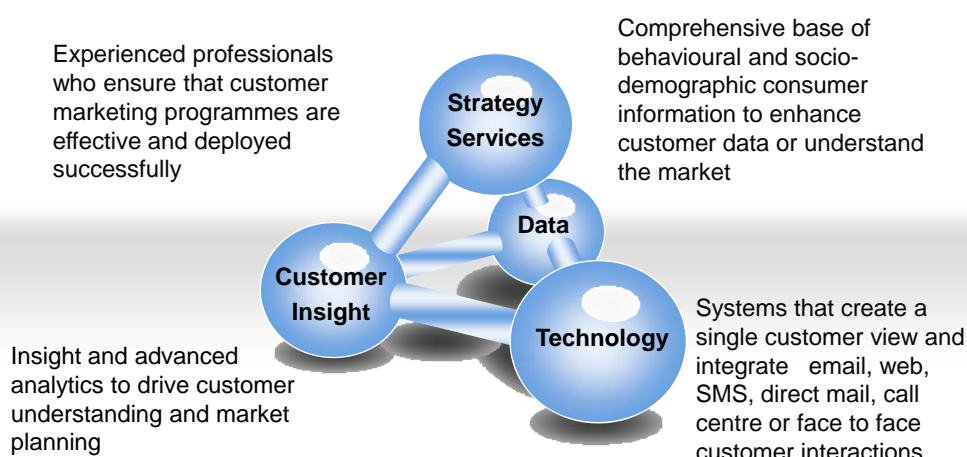
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- Brief Overview of CACI
- ACORN – What is it?
- What do we know about You?
- Applications of ACORN
- Case Study

## Brief Overview of CACI

- **CACI**
  - US parent with £2bn turnover (NYSE), employs approx. 9,000 people
  - In the UK for 34 years, £70m turnover, over 600 people
- **A progressive marketing services business:**
  - Understand the dynamics of customers, markets, channels and outlets
  - Support pragmatic application of new technology and techniques
  - Provide expertise to drive change and implement in all channels
- **Deep expertise:**
  - CSG Team is over 200 people, £16m+ turnover in the UK
  - Clients include companies such as Vodafone, Sky, Telegraph Group, Legal & General, AXA, Lloyds Banking Group, RBS, EDF, DFS

## Overview of CACI





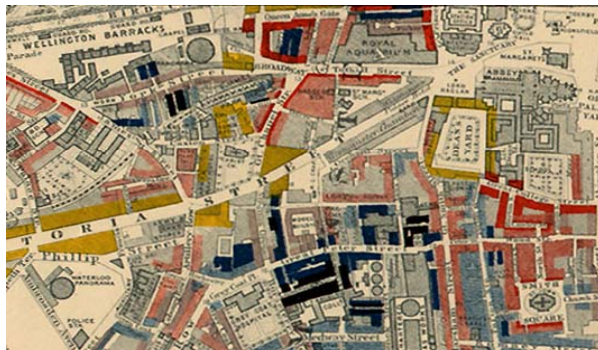
## What is ACORN?

- A
- Classification
- Of
- Residential
- Neighbourhoods

## Charles Booth 1889

The Streets are coloured according to the general condition of the inhabitants, as under--	
Lowest class. Vicious, semi-criminal.	Fairly comfortable. Good ordinary earnings.
Very poor, casual. Chronic want.	Middle-class. Well-to-do.
Poor. 18s. to 21s. a week for a moderate family.	Upper-middle and Upper classes. Wealthy.
Mixed. Some comfortable, others poor.	

*A combination of colours— as dark blue and black, or pink and red— indicates that the street contains a fair proportion of each of the classes represented by the respective colours.*



Which one is Ethel?  
Which is Kayleigh?



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## ACORN – The basic concepts

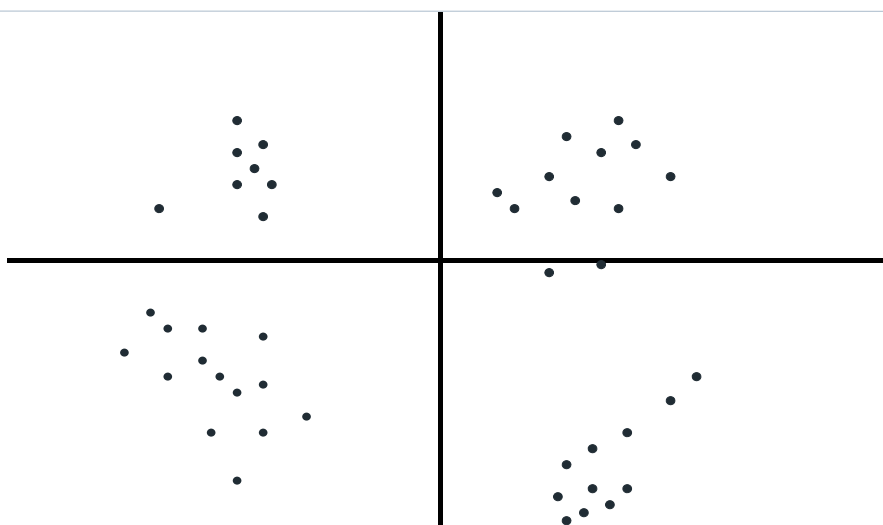
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- People in similar areas have the same needs and lifestyles
- You can find these people
  - The historical importance of the UK postcode
- Without ever having met, or heard of, somebody we aim to predict
  - Likely household composition
  - Likely spending patterns
  - Likely ownership of financial services
  - Likely channel for servicing their financial services
  - Likely risk that they are to your company
- And more often than not get it right!

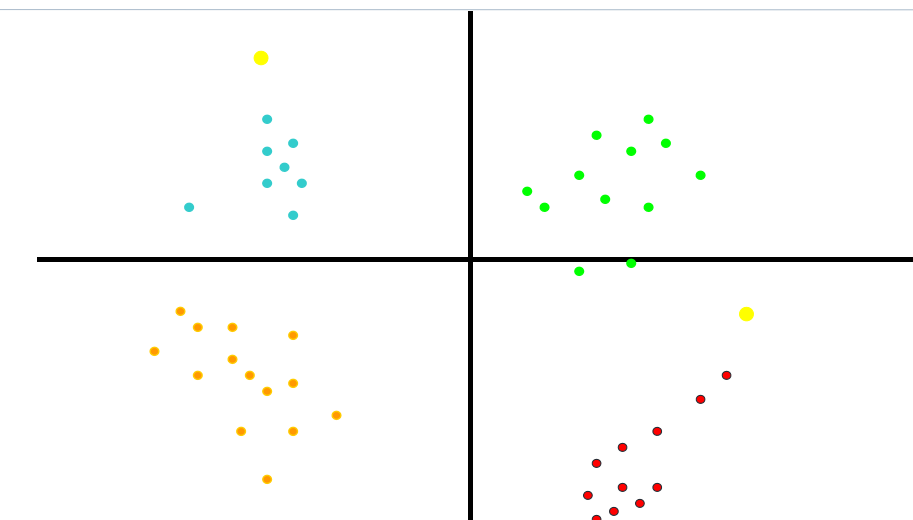
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## How many groups of dots?

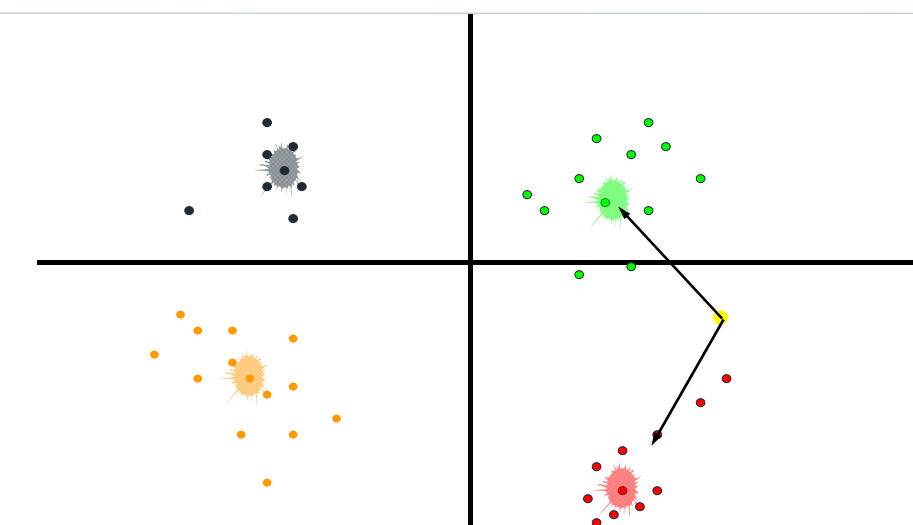
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Which of the 4 'types' is the yellow dot?



Add the centres of each 'type'



## So where's the difficulty?

- The maths does not give an answer, its down to experience
- Which of many solutions is “the best”?
- How will you measure ‘closest’
  - Which variables matter?
  - How to define variables?
  - What is the relative importance of variables?
- Deciding how many types you want

## The approach

### Stage 1

Classify Census Output Areas

### Stage 2

Introduce additional data sets  
Re-classify postcodes if valid

### Stage 3

Repeat stage 2 each year to update data  
where it is valid

} We only  
change  
where its  
clear-cut

## Frequent misunderstandings

- People imagine we come up with type names or descriptions and then allocate areas to these
  - The type comes first, defined by the statistics
  - The name and description are *optional* extras added later
- People imagine the name, or the description, is the hard definition of a type
  - Descriptions only provide a superficial picture
  - Names simply describe the majority behaviour, or highlight special features

## It's the numbers, not the names!

Type 6 - **Farming** communities

- only 22% of the people are farmers
- named so because this proportion is 10 times the average

Type 31 - Home owning **Asian** family areas

- only 40% of the people
- 10 times the average

Type 23 - **Student** terraces

- only 38% of the people
- 5 times the average

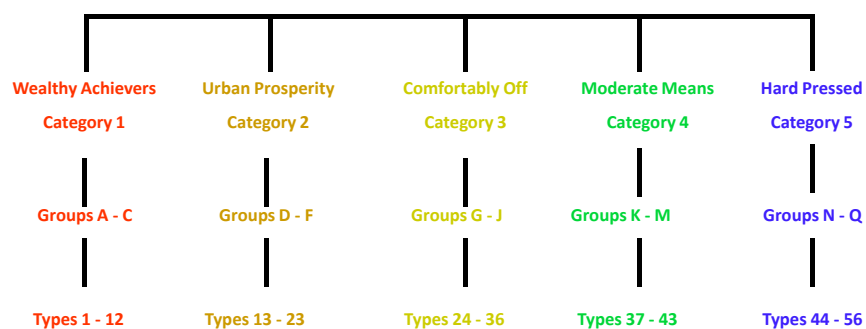




## So beware the ecological fallacy

- People often misinterpret, or misrepresent what geodemographic classifications are saying – and what they are not saying
  - If it's called a farming area and/or farming is mentioned in the text describing the type one is *more likely to find* people undertaking this activity in such areas.
- There is *no suggestion that 'everyone'* in the type is a farmer
  - Indeed, since it's a multivariate classification, all we can really say is that *the area's population exhibits demographics characteristics that are typically found in areas where there are farmers*. The number of actual farmers *might* be no higher than average

## ACORN – The structure



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**So what do we know about you or me?....**

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## **W5 4EU**

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- Type 13 - Well-off professionals, larger houses and converted flats
  - Predominantly well-off living in urban areas such as Ealing, Richmond, Chelsea, Wandsworth, Barnet, Oxford and Cambridge
  - Professional/managerial occupations, some students starting out
  - Large houses, 3 or 4 bedrooms, often Georgian/Victorian terraces
  - Owner occupied, by professional couples and families
  - Car ownership but use public transport for travel to work
  - Financially aware, high levels of S&I, more likely to switch service providers
  - High levels of credit card usage
  - Spending on clothes is high
  - Technologically sophisticated consumers make great use of the internet including financial services and buying other products and services
  - Guardian, Independent, The Observer, Times

## ACORN – W5 4EU



## Applications of ACORN



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## CACI Classifications

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FRESCO 

*people*<sup>\*</sup>UK

eTypes



greenacorn

financial <sup>acorn</sup>

**HealthACORN**

**StreetValue**

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## Case Study

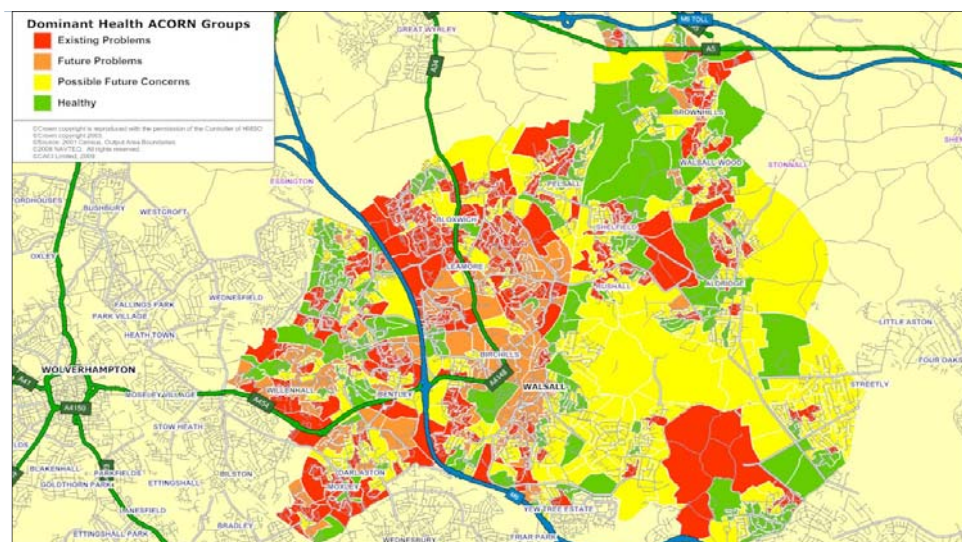
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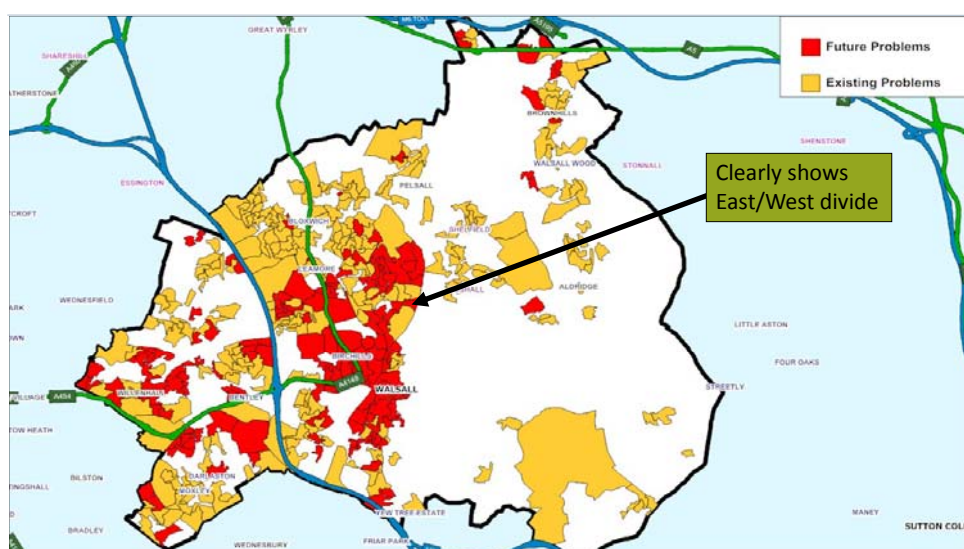
NHS Walsall

Stop Smoking Service and HES Data Analysis

## Walsall - HealthACORN

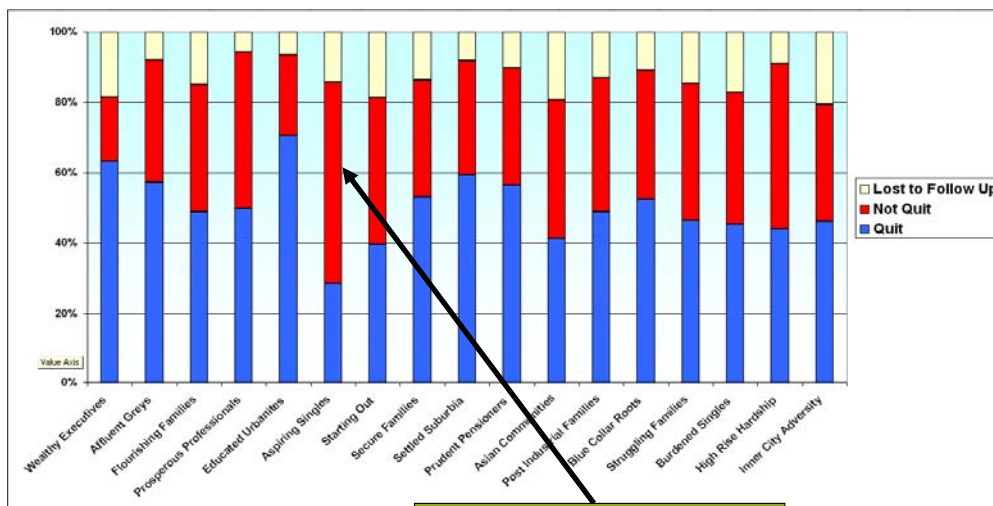


## Walsall – HealthACORN: Key Groups



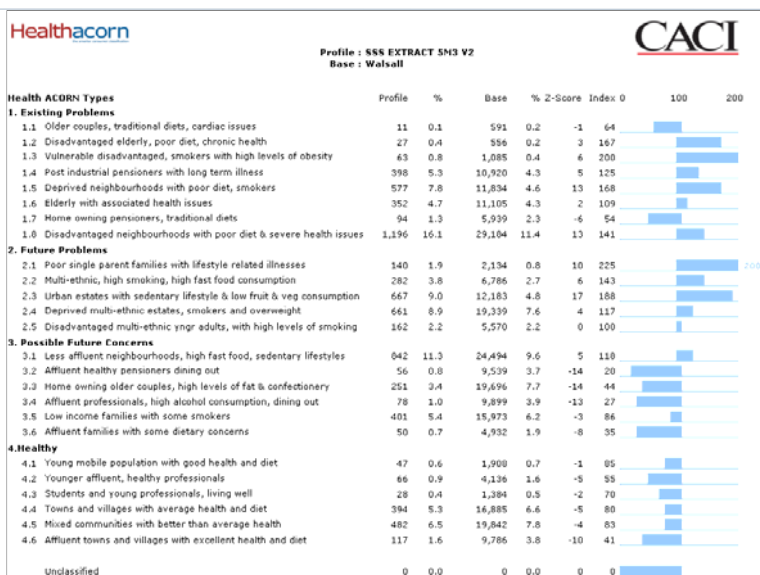


## All SSS records profiled by ACORN



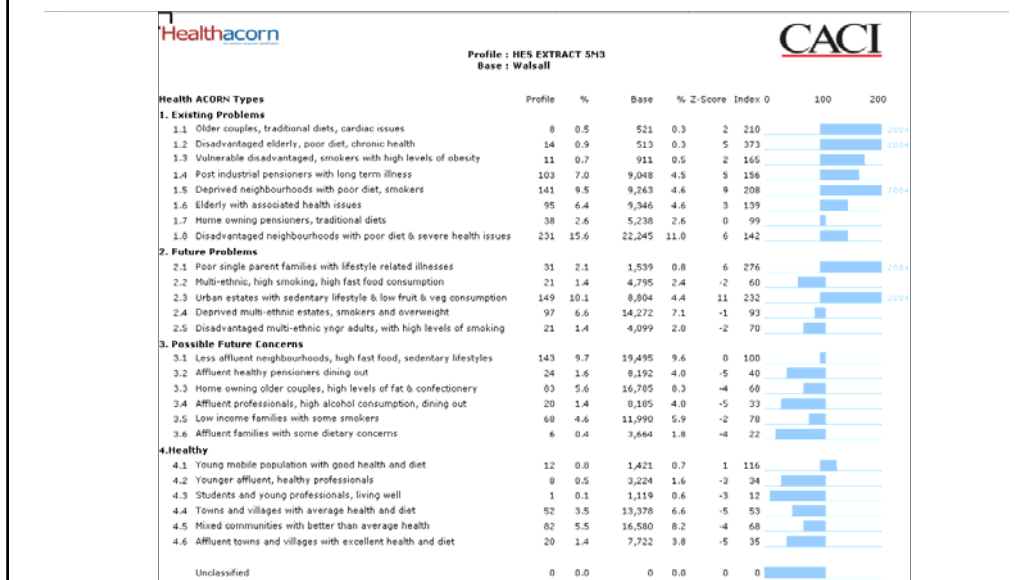
"Aspiring Singles"  
highest proportion of Not-Quit Rate

## All SSS records profiled by HealthACORN

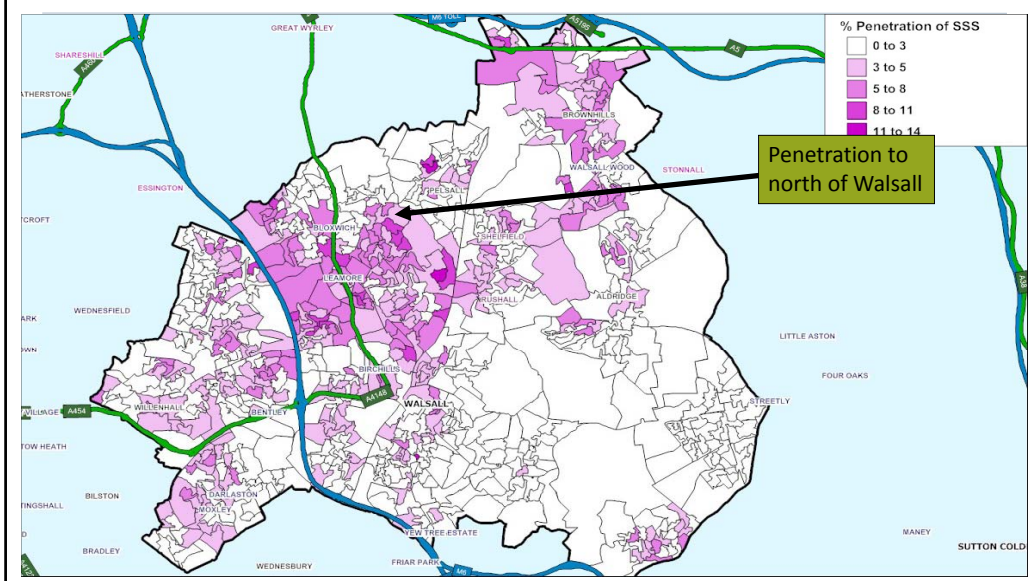




## All HES records profiled by HealthACORN

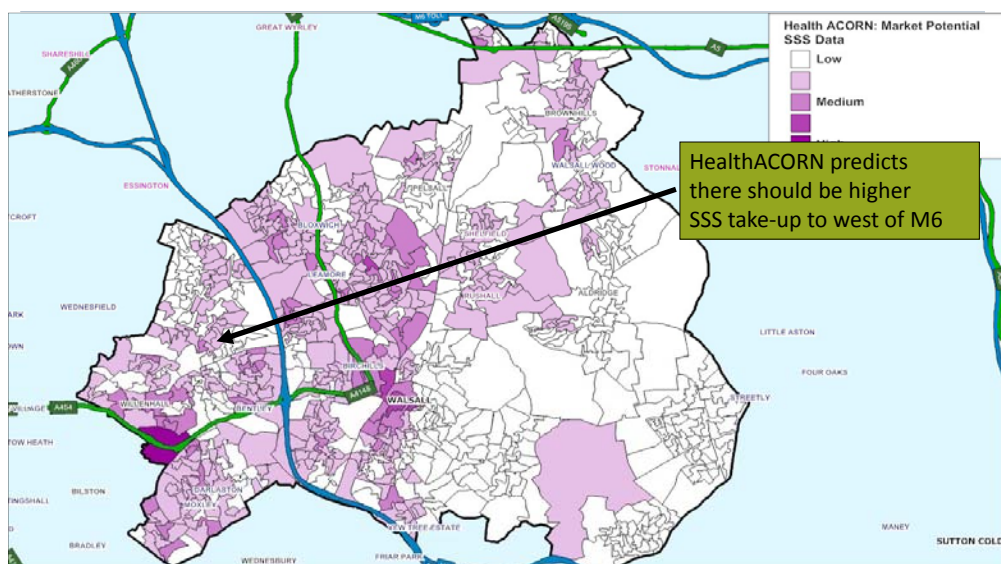


## % Penetration of SSS into Total Population





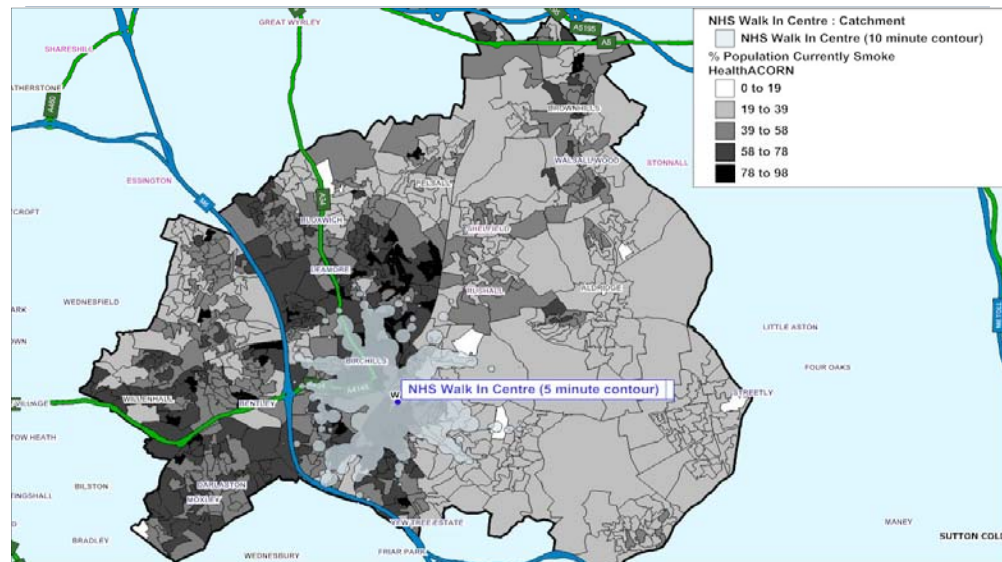
## Market Potential of SSS Postcodes using HealthACORN



## HealthACORN: Currently Smoke



## 5 Minute Public Transport Catchment



## Summary

- Part art, part science but you can determine the healthy, wealthy and wise
- Many uses for marketing, pricing, health, mortality...
- More tools for specific applications and sectors to a low level of granularity
- The future is already here with individual level tools
- Look up your ACORN type on line or e-mail [ktester@caci.co.uk](mailto:ktester@caci.co.uk) with any requests...

**ACORN - The Leading Geodemographic Classification Tool - Welcome**

http://www.caci.co.uk/acorn/

File Edit View Favorites Tools Help

ACORN - The Leading Geodemographi...

**acorn**

**Welcome to the New ACORN**

The Census is the most comprehensive survey of the UK, but on its own it does not tell us everything we need to know about the population and its behaviour.

ACORN's *Flourishing Families*, *Aspiring Singles*, *Settled Suburbia* and *Inner City Adversity* all show that the population has different characteristics and purchasing patterns. By using ACORN, the smarter consumer classification, you will have a true and detailed picture of your customers and prospects.

To find out more about the various ACORN categories, groups and types - please visit the [ACORN Map](#).

What ACORN type is your neighbourhood? Trial our ACORN postcode lookup [here](#).  
(Trial limited to a maximum of 20 postcode lookups and registration required)

**What's Your Financial ACORN Type?**

**CACI Login**

**Register here**

**Login here**

**Forgotten Passkey**

**New ACORN User Guide NOW AVAILABLE** - Download from [caci.co.uk](http://www.caci.co.uk)

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