INTRODUCTION
Antibiotic resistance is an increasing global public health issue driven by the over-use of antibiotics and inappropriate prescribing, making available antibiotics less effective and contributing to infections which are hard to treat.1,2

As part of UK activities for European Antibiotic Awareness Day (EAAD), and in support of the UK 5-year AMR strategy,3 PHE developed the Antibiotic Guardian (AG) campaign to move from raising awareness to engagement and stimulating behaviour change in 2014.4 AG is an intervention to improve knowledge and behaviours regarding antibiotic prescribing and use among both healthcare professionals and the public through an online action-based pledge system.

The objective for the first year was for 10,000 healthcare professionals and members of the public choose a pledge on www.antibioticguardian.com by 30 November 2014.

METHODS
Activities and resources for EAAD and the AG campaign were developed and run by a PHE-led interdisciplinary committee with representation from animal and health sectors and the public across the UK.

The pledges underwent a two-month user testing phase which included consultation with behavioural scientists and marketing specialists prior to the formal launch of the website on 13 September 2015.

Individuals who pledged on antibioticguardian.com provided personal data (name, half postcode, email) and selected an option for how they had heard of the campaign. Google analytics collected data on all website visits, the proportion which made a pledge, the route via which a visitor arrived at the website and identified unique visitors and location from an IP address. Google analytics data collection began on 08 August 2014, two weeks after the website was accessible online.

The primary outcome of choosing a pledge was assessed by location (UK half postcode; Figure 2), time (Figure 3), distribution by pledge groups (Figure 4).

RESULTS

Figure 2. Variation in the distribution of 11,833 Antibiotic Guardians across the UK by NHS Area Teams and Health Boards by 28 January 2015.

Figure 3. Comparison of unique visitors to antibioticguardian.com to the total number of Antibiotic Guardians between 08 August 2014 – 20 January 2015. Conversion rate is the proportion of unique visitors who make a pledge (20% conversion rate; n=12,509 pledges; n=47,158 unique visitors).

Figure 4. Distribution of pledges by target audiences; 69% of Antibiotic Guardians made as pledge as a Healthcare Professional.

CONCLUSIONS

• The first year of the campaign met the campaign goal of 10,000 Antibiotic Guardians by 30 November 2014.
• There was significant heterogeneity in the spread of antibiotic guardians across the UK and unexpected engagement globally.
• AG was primarily driven and engaged with by healthcare professionals (69%) with a majority of engagement aligning with EAAD in November.
• Active and direct engagement during the campaign has been illustrated and this study demonstrates measurable engagement in an AMR public health campaign for the first time in the UK.1
• A major limitation was the inability to link Google Analytics to pledge data; we are unable to draw conclusions between the datasets.
• There was a marked decline in activity after EAAD (18 November) as demonstrated in Figure 2, while AG was launched in support of EAAD, sustained effort will be required for campaign engagement throughout the winter season in the upcoming year.
• These data will be used as a baseline for future process evaluations.

• To extend the AG campaign throughout the cold and flu season, and not plateau as shown, the campaign would require sustained effort and outreach from PHE and partner organisations. Future work to develop the campaign should investigate how to best engage with target audiences and embed this new initiative within both public and professional spheres.
• As an ongoing campaign aiming to build sustainable behaviour change in the UK, AG was updated in light of the feedback and evaluation studies undertaken after the first year of the campaign and is planned to run during the 2015–2016 winter season.
• A new goal of 100,000 Antibiotic Guardians by 31 March 2016 has been set. By setting the new goal date in March, we can improve organisational support throughout the winter season. There are 63 million people in the UK. We can aim to achieve 100,000 Antibiotic Guardians across the UK if 1 in 25 NHS non-clinical staff, and 1 in 1000 of the population become Antibiotic Guardians.

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REFERENCES