

ANNEX 1

**PATIENT LOCATION MAPS FOR THE [X] [CONFIDENTIAL] PROBLEMATIC
RAMSAY HOSPITALS**

1. INTRODUCTION AND SUMMARY

- 1.1 A key part of the CC's local market analysis is its approach to geographic market definition, and, in particular, the extent to which patients within a hospital's catchment area have choices between different hospitals.
- 1.2 In order to assess the geographic scope of the local market, the CC has carried out a quantitative analysis of private hospitals' catchment areas. More specifically, the CC states that it has sought to identify the catchment areas in which a hospital derives the closest 80 per cent of its insured patients for inpatient services.¹
- 1.3 However, as the specific adverse effects identified in relation to Ramsay relates only to local market power for self-pay patients (i.e. no adverse effects have been identified in relation to negotiations with insurers), the CC's focus on insured patient catchment areas is flawed.
- 1.4 This Annex sets out a series of maps [X] [CONFIDENTIAL] in relation to the [X] [CONFIDENTIAL] problematic Ramsay hospitals, which show the locations of where Ramsay's self-pay patients are drawn and compares them to the catchment areas defined by the CC (the "**Core Catchment Areas**"). The maps show that:
- (a) there are statistically significant clusters of Ramsay patients located outside of the CC's chosen catchment area for each hospital. This shows that the CC's analysis has resulted in some overly-narrow Core Catchment Areas being defined, which has resulted in it ignoring important competitive constraints in its local market assessment;
 - (b) catchment areas defined on the basis of a 45-minute drive-time [X] [CONFIDENTIAL];
 - (c) [X] [CONFIDENTIAL];²
 - (d) there are many examples of clusters of patients that are located closer to rival hospitals than they are to the Ramsay hospital, which shows the choices that they have available and the distances that they are prepared to travel; and
 - (e) by failing to consider the dispersion of Ramsay's patients and excluding competition from rival hospitals located outside the Core Catchment Area of the Ramsay hospital, the CC has manifestly failed to consider the range of alternatives facing a significant proportion of Ramsay's patients.
- 1.5 In this regard, Confidential Annex 3 sets out a series of maps which shows the extent to which the Core Catchment Areas of rival hospitals overlap with the Core Catchment Areas for the [X] [CONFIDENTIAL] problematic Ramsay hospitals (based on the CC's overly-cautious catchment area analysis for insured patients). These maps clearly demonstrate the extent to which different hospitals are drawing patients from the same areas, which the CC's local market analysis has largely failed to consider. Accordingly, the maps set out

¹ Paragraph 6.93 of the PFs.

² [X] [CONFIDENTIAL].

in Confidential Annex 3 should be viewed in conjunction with the maps contained in this Annex.

2. **METHODOLOGY**

- 2.1 In order to produce self-pay patient location maps for each of the [X] [CONFIDENTIAL] problematic Ramsay hospitals and carry out the analysis set out below, Ramsay has relied on the data that was provided in response to the CC's data questionnaire on 7 September 2012 (the "**DQ Data**"). The DQ data relates to Ramsay invoices for self-pay patients between July 2007 and August 2012, and includes a full list of patient postcodes.
- 2.2 As set out further in Annex 4, it is clear from the CC's national pricing analysis (and the CC's overall conclusions) that Ramsay does not have any local market power that affects the national price negotiations with insurers. For example, Table 15 of Appendix 6.12 of the PFs shows that Ramsay offers the lowest national prices to insurers out of the four national PH operators, across all the different pricing metrics considered by the CC. Accordingly, focussing on catchment areas in relation to insured patients is entirely inconsistent with the adverse effects identified, which relate to self-pay patients only.
- 2.3 Moreover, not only is the self-pay information readily available and more directly relevant to adverse effects identified for Ramsay, it also presents a more meaningful basis for assessing the choices available to patients. By focusing on the distances that insured patients currently travel (which depends on PMI referral patterns), the CC's analysis does not provide any meaningful insight upon the actual or potential choices available to patients. If insurers are generally referring patients to their closest hospital (e.g. because it is already in their network and the price of treatment is the same across all facilities due to the national price negotiations), then this will obviously understate the actual distances that patients are willing to travel.
- 2.4 On the basis of this extensive source of self-pay patient location information, Ramsay has used specialised software [X] [CONFIDENTIAL] in order to create maps which identify patient locations and compared them to (i) the CC's defined catchment area for each of the [X] [CONFIDENTIAL] allegedly problematic Ramsay hospitals (referred to throughout this response as Core Catchment Area); and (ii) catchment areas based on a 45 minute drive-time. These maps are provided at [X] [CONFIDENTIAL] of this Annex. This allows us to compare whether the Core Catchment Areas defined by the CC (on the basis of insured patients) provide a realistic basis for assessing the locations from which the Ramsay hospitals actually draw patients from.

3. **ANALYSIS**

- 3.1 All of the maps provided in this Annex [X] [CONFIDENTIAL] show that:
- (a) there are significant clusters of Ramsay patients located outside of the CC's Core Catchment Area for each hospital. This shows that the CC's analysis, which is erroneously based on insured patients, has resulted in some overly-narrow catchment areas being defined. This in turn means that the CC is failing to take into account the full range of competitive constraints that exist on the Ramsay hospitals, which is leading the CC to reach inaccurate conclusions;
 - (b) by ignoring drive-time, the CC's analysis has failed to consider the dispersion of Ramsay's patients both within and outside those Core Catchment Areas (e.g. along the major trunk roads, which allow patients to travel further afield for treatment). In this regard, [X] [CONFIDENTIAL];
 - (c) the maps show that there are many examples of clusters of patients that are dispersed across the 45 minute catchment area that are located much closer to rival hospitals than they are to the Ramsay facility. This clearly demonstrates the

choices that these patients have available, and the distances that they are prepared to travel for treatment, which the CC's LOCI analysis has completely failed to recognise; and

- (d) by failing to recognise competition from rival hospitals located outside the Core Catchment Area of the Ramsay hospital, the CC has manifestly failed to consider the alternatives facing a significant proportion of Ramsay's patients (as discussed further in Confidential Annex 3). This means that the CC has only carried out a partial local market analysis by failing to consider all the relevant competitive constraints that apply to the [X] [CONFIDENTIAL] allegedly problematic Ramsay hospitals.

- 3.2 The existence and scale of such numbers of patients residing on the fringes and outside of the CC's Core Catchment Areas demonstrate unequivocally that the CC has implemented an inadequate method for assessing the catchment area for each of the [X] [CONFIDENTIAL] allegedly problematic Ramsay Hospitals, which typically results in the catchment areas around these hospitals being understated. Moreover, this has the effect of understating the constraint imposed by a number of competing fascias from the CC's local market assessment, particularly in relation to those hospitals located outside the Core Catchment Area of the Ramsay hospital. This is an obviously unsound analytical and evidential basis upon which to impose a remedy such as Remedy 3 upon Ramsay.

Core Catchment Areas understate the geographic market definition

- 3.3 Whilst catchment area analysis is often used for the purposes of identifying the location of customers, it is not directly related to the assessment of the geographic market definition, which is ultimately what is relevant for the purposes of a competition assessment.³ If a sufficient number of patients would be willing to switch to another provider in a different geographic area in response to a 5-10 per cent increase in price (or reduction in quality or some other parameter of competition) then it would suggest that the geographic market is actually wider than is being considered on the basis of a static catchment area approach.
- 3.4 The evidence suggests that the catchment area for Ramsay's self-pay patients is [X] [CONFIDENTIAL] 45 minute drive-time from the hospital in question, which is confirmed by:
 - (a) [X] [CONFIDENTIAL]; and
 - (b) the CC's own patient survey, which identified that self-pay patients would travel on average for 45 minutes.
- 3.5 However, the CC's patient survey also shows that increases in the price/cost of treatment is an important factor that would encourage patients to travel further than a 45 minute drive-time for treatment.
- 3.6 For example, slide 51 of the CC's patient survey shows that 35 per cent of self-pay patients said that they would be willing to travel further for treatment from a lower cost hospital and 29 per cent would travel further in response to lower fees paid to consultants. This suggests that price (and, in particular, increases in price) is a reason for self-pay patients to travel further than 45 minutes, which indicates that the geographic market definition for the purposes of a competition assessment is even wider than that defined on the basis of pure catchment area approach.

³ In this regard, many competition authorities worldwide define markets by reference to the so-called "hypothetical monopolist" or "SSNIP" test. The test seeks to assess how customers would respond to a 5-10 per cent increase in price (or reduction in quality or some other parameter of competition).

- 3.7 Furthermore, even in relation to insured patients, if the prices of a particular provider sought to increase prices by 5-10 per cent, it is implausible to suggest that insurers would not seek to divert patients to an alternative provider further away as a result. Indeed, insurers *are already doing* this in order to drive prices down.

Importance of infra-marginal patients

- 3.8 By excluding large numbers of patients that travel from further afield (i.e. from outside the Core Catchment Area), and those that would travel further afield if there was an increase in price (or reduction in quality or some other parameter of competition), the CC's analysis has failed to take into account the importance of those patients (e.g. in terms of providing a contribution to the fixed costs of operating a private hospital). The economics of running a private hospital mean that it is competition for those infra-marginal patients which, ultimately, has a significant bearing on whether a private hospital is commercially viable or not. The fact that the methodology chosen by the CC actually specifically excludes these infra-marginal patients is a further explanation as to why it has produced misleading and biased results.
- 3.9 The fact that Ramsay's patients are drawn from a far greater distance than has been considered by the CC is also particularly pertinent in light of the critical loss analysis set out in Annex 5. [X] [CONFIDENTIAL]. It is these infra-marginal customers that are, therefore, of particular relevance to the local market analysis, which the CC has blatantly failed to consider. By focussing on "average" patients, rather than the infra-marginal patients, the CC has materially overstated the local market concerns that arise.
- 3.10 In addition, the CC's local market analysis has inherently failed to consider the extent to which the Core Catchment Areas of different rival hospitals overlap with the Core Catchment Areas of the [X] [CONFIDENTIAL] problematic Ramsay hospitals (i.e. the extent to which patients located in different areas have the choice between different hospitals, and different hospitals are targeting patients located in similar locations). This is considered further in Confidential Annex 3, where the CC's local assessment of the [X] [CONFIDENTIAL] allegedly problematic Ramsay hospitals is examined in detail.

Conclusion

- 3.11 These crucial flaws in the CC's assessment of local market power fundamentally undermine the CC's provisional finding of local market power for Ramsay in relation to the [X] [CONFIDENTIAL] identified hospitals of concern.