Calling the GP surgery: patient burden, patient satisfaction, and implications for training

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Calling the GP surgery: Patient burden, patient satisfaction, and implications for training
ABSTRACT

BACKGROUND: Good communication is central to the effectiveness of general practice (GP) service provision, as well as to patient satisfaction with surgeries, but very little is known about the actual communication that occurs between patients and surgeries.

AIM: This study was carried out to examine, for the first time, how receptionists interact with patients on the telephone, in order to identify features of communication associated with efficacy and patient satisfaction.

DESIGN AND SETTING: We conducted a qualitative conversation analysis of incoming patient telephone calls, recorded ‘for training purposes’, in three English GP surgeries.

METHODS: Data were analysed qualitatively to identify effective communication, then coded to establish the relative prevalence of communication types across each surgery.

RESULTS: Analysis identified a burden on patients to drive calls forward and achieve service. ‘Patient burden’ occurred when receptionists failed to offer alternatives to patients whose initial requests could not be met, or to summarize relevant next actions (e.g., appointment, call-back, etc.) at the end of calls. Coding revealed that ‘patient burden’ frequency differed across the services. Increased ‘patient burden’ was associated with decreased satisfaction on published satisfaction survey scores.
CONCLUSION: Patients in some practices have to push for service when calling GP surgeries. Conversation analysis specifies what constitutes (in)effective communication. Findings can then underpin receptionist training and improve patient experience and satisfaction.

KEYWORDS
Communication, general practice, medical receptionist, patient satisfaction, evaluation

HOW THIS FITS IN
Patients’ first point of contact with general practice is the doctor’s receptionist, often over the telephone. Very little is known about these encounters or what might underpin patients’ experience of good or bad service. In some practices, patients have to push to achieve service from receptionists. Alleviating the burden on patients through particular communication strategies is likely to improve patient satisfaction.

KEY MESSAGES

- Patients can struggle to achieve service when calling GP receptionists.
- When patients’ first request could not be met, receptionists who made alternative offers and who summarized relevant next actions were most effective.
- Post-hoc surveys of patient experience cannot specify what analysis of real-time receptionist-patient communication can; the study identifies what to train receptionists to do (and not do) to improve the patient experience.
INTRODUCTION

Given the centrality of general practice (GP) receptionists to patients’ experiences of their GP surgery, as well as access to primary care, there is surprisingly little research on telephone calls between receptionists and patients. Survey-based research shows that the helpfulness of the receptionist, along with communication with the doctor, is the most important driver for satisfaction amongst UK patients, [1] but we know little about what constitutes such helpfulness; that is, evidence of what needs to change in order to improve patient experience regarding access to their GP. Issues of ‘experience’ and ‘satisfaction’ are routinely addressed using post-hoc surveys or focus groups and interviews. [2] The disadvantage of such methods is that they do not tell us what and how problems occur in actual patient-healthcare provider encounters. Practitioners struggle to identify and action changes based on survey feedback alone [3] and knowing what to improve can be based on “hunches” or “best guesses” [4, p.480]. The objective of this study is to analyse how receptionists interact with patients in order to identify effective practice that can then inform receptionist training. So far ethnographic research has explored the range of tasks receptionists engage in (e.g., allocating patient appointments, relaying test results, managing repeat prescriptions), some concluding that complexities and constraints in the receptionists’ job affect their ability to facilitate patient access. [5-7] While previous research identifies what might be perceived as challenging in receptionist-patient interactions, it does not identify how these challenges are dealt with more (or less) effectively; that is, what should receptionists in poorly
performing surgeries be trained to do, to improve? The starting point in our research is that front-line receptionists provide opportunities for both good and bad experiences in the way they handle, for example, external constraints like the availability of appointments, and access to test results. To the best of our knowledge, only Hewitt et al. have studied receptionist-patient encounters in this way, and they examined face-to-face front desk communication rather than incoming calls. [8]

**METHOD**

**Setting and participants**

2780 audio-recorded incoming telephone calls between patients and receptionists were recorded from three General Practice surgeries in England in October 2014. The recordings were anonymised digitally (swapping names of patients, surgeries, locales, for fictional alternatives). Table 1 provides a summary, including the number of receptionists and patients, number of telephone calls collected, and deprivation index (from The English Indices of Deprivation 2015). All three surgeries operated with online as well as telephone services for booking appointments, but most of the enquiries are done over the phone (see Table 1).

<table>
<thead>
<tr>
<th>GP1</th>
<th>GP2</th>
<th>GP3</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Total number of receptionists</strong>&lt;br&gt;(Number of receptionists recorded in brackets)</td>
<td>9 (9)</td>
<td>9 (8)</td>
</tr>
<tr>
<td><strong>Total number of patients</strong></td>
<td>5987</td>
<td>7691</td>
</tr>
<tr>
<td><strong>Proportion of appointments booked over the phone</strong></td>
<td>96%</td>
<td>92%</td>
</tr>
<tr>
<td><strong>Index of Multiple Deprivation (2015; in deciles, lower numbers indicate higher level of deprivation)</strong></td>
<td>7</td>
<td>3</td>
</tr>
<tr>
<td>Number of calls collected for this study</td>
<td>613</td>
<td>582</td>
</tr>
<tr>
<td>-----------------------------------------</td>
<td>-----</td>
<td>-----</td>
</tr>
<tr>
<td>Number of calls selected for analysis</td>
<td></td>
<td></td>
</tr>
<tr>
<td>(final number of calls reported in quantitative analysis)</td>
<td>150 (149)</td>
<td>150 (148)</td>
</tr>
</tbody>
</table>

**Data analysis**

From each surgery, the 150 first calls (according to recording time) were selected for detailed analysis. 447 calls were analysed in total (3 calls were excluded as they were calls from other professionals). All selected calls were transcribed verbatim, and extracts for conversation analysis (CA) were transcribed using CA’s standard system which encodes phonetic information about the way talk is delivered [8, 9]; we present simplified extracts in the Results section. CA starts by repeatedly viewing or listening to recorded data, with the technical transcript. It proceeds to analyse systematically the activities that comprise the complete interaction (e.g., greetings, requests, offers); and shows how the design of an activity places constraints on the ways that responses can be made. By analysing the sequence of conversation turn by turn, CA can assess participants’ understandings within the interaction itself, rather than from analysts’ *a priori* interpretations of what is happening.

On the basis of our initial analysis we developed a set of coding questions and their response alternatives. The range of questions addressing appointment making included whether the patient was able to get an appointment, what type of appointment it was, and whether or not patients had a preferred GP. Figure 1 gives an overview of the enquiries made in the data. The labels most relevant to this paper and their Kappa values for inter-rater reliability are summarized in Table 2 (Appendix). The inter-rate reliability score on 20% of the calls between two coders, resulted in a Kappa score of 0.78. This is
regarded as ‘substantial agreement’ and very near the ‘perfect agreement score’ above 0.80. [10] The labels were compared between the surgeries using chi-square tests. [11]

![Bar chart showing patient enquiries](chart.png)

Figure 1. Overview of patient enquiries in the analysed recordings.

**RESULTS**

We identified a ‘burden’ on patients to push for service in two main phases of the telephone calls. The first was near the start, in which first requests were not met by receptionists. The second was at the end of calls, when the appointment or service had been completed but some detail remained unclear to the patient. In these cases, receptionists moved to close calls prematurely, leaving patients needing to push back into the call for additional information or confirmation. We provide examples of each type of burden and how more effective receptionists acted to anticipate or remove it.
Receptionists offer or fail to offer alternative courses of action

In Extract 1, the patient (P) calls the surgery and asks the receptionist (R) for an appointment. Numbers in brackets represent timed gaps between turns.

(1) GP3-14
1 R:  Good morning, surgery Cath speaking,
2   (1.6)
3 P:  Hello have you got an appointment for
4     Friday afternoon or teatime please.
5   (0.4)
6 R:  This Friday.
7   (1.1)
8 P:  Yeah,
9 R:  Uh I’m sorry we’re fully booked on Friday.
10   (1.6)
11 P:  Right.
12   (0.3)
13 R:  (We’re) fully booked.
14 P:  Okay,
15   (0.3)
16 R:  Okay.
17   (0.4)
18 P:  Yeah, uh okay, [uhm,]
19 R:  [Than]k yo[u ]
20 P:  [Is] it worth me
21   ringing Flaxton.
22 R:  We’re fully booked this Friday at
23     Flaxton I can see, wi- we don’t open
24     Fri[day afternoon]ns at Flaxton
Having requested an appointment (lines 3-4), R checks which Friday P is referring to and then tells P that they are “fully booked” (line 9). At line 10, a gap of 1.6 seconds opens up, in which R could offer a different date (or make an alternative action to, say, ask about urgency). In other words, R could progress the call to a conclusion that involves giving service for P. However, R moves to call the close (‘[ ]’ represents overlapping talk).

R reiterates that they are fully booked (line 13), and moves to close the call (“Okay” and “thank you”, lines 16, 19). P sounds reluctant to close (line 18). At lines 20-21, she pushes back into the call, overlapping the end of R’s turn, to ask if it is worth calling the sister surgery. This is our phenomenon of interest: rather than R offering an alternative course of action, the burden is on P to keep the call going and push for service. However, P’s alternative suggestion is also rejected by R (lines 22-24).
R rejects the possibility of P getting an appointment at Flaxton, again without offering any alternative course of action. This time P goes along with R’s closing.

It is striking how R initiates a closing without any alternative proposal being made. An alternative is treated as absent by P who pushes for an alternative. This kind of patient burden was common across the dataset. More effective receptionists made immediate alternate offers when the patient’s first request could not be met (‘=’ represents rapid transitions between turns), as in Extract 2.

(2) GP-143

1 R: Good morning, Limetown Surgery,
2 P: =Good morning, Could I have an appointment to see
3 Doctor Wilkinson please=
4 R: =ptkkhh hh uh:m let me see when the next available
5 one is.=I don’t think I’ve got anything pre bookable
6 this week .h[hh    ] d’you want me to look for the=
7 P:              [(uhum)]
8 R: =week after.

Following P’s request for an appointment, R informs her that Dr Wilkinson is not available to pre-book during the current week. However, rather than let a silence open up or initiate a closing, R moves immediately to offer to look for appointments the week after (lines 6-8).
Receptionists confirm or fail to confirm appointments and next actions

Patients often attempted to reopen receptionist-initiated closings, to raise further business (e.g., confirming what will happen next). In Extract 3, P has called about results from an x-ray that has not arrived.

(3) GP1-5

1 R: .pthhhhh I probably- uh so I’d probably give it to the
2     middle of this week,
3 R:  uhm cos it’s only been a week tomorrow,=has it,
4     (1.4)
5 P:  Right
6     (0.2)
7 R:  Uhm and then we’ll start to chase it up if we’ve still
8     not heard anythin’.
9     (0.3)
10 P:  (.hh) Okay.
11 R:  .ptk All right?
12 P:  Uh when shall I ring. [ Tomor[row or-(m), ]
13 R:  [.hh][So if you give ] us a call
14     tomorrow afternoon
15     (.)
16 P:  Okay.
17     (0.2)
18 R:  All right?
19 P:  All right [then.]
20 R:  [THAn ]k you.=
21 P:  =Tha[nks,=bye.
The receptionist suggests that P waits until the middle of the week (lines 1-2), and that they will otherwise “start to chase it up” (lines 7-8). P accepts this offer (“Okay”) which is followed by R’s closing-implicative “All right?”. However, what is missing is precisely who should call whom and when next, which P asks about next.

Instead of joining in with R’s closing moves, P seeks to specify when to best get in touch, asking “Uh when shall I ring.” and suggesting “tomorrow or-” (line 12). In other words, it is not clear to P how to interpret ‘middle of this week’. Following R’s suggestion of a time to call back, P accepts (line 16), and R initiates call closing (line 18). This time, P joins in with the closing. But the burden is on P to push for this confirmation and to make the follow-up call.

In over half of appointment-making calls, receptionists summarize appointments only in response to patients pushing for such confirmations. Extract 4 is one example, where P has made an appointment and now R asks for his address.

(4) GP2-28

1 R: What’s your address please.
2 (0.6)
3 P: Eighty four Tern Way.
4 R: Okay then,
5 (0.5)
Here, R treats the call as completed (lines 4 and 7), but P wants his appointment confirmed (lines 6 and 9). Like Extracts 1c and 3, there is a ‘crash’ in the call, where both speakers talk in overlap, and therefore pursue different actions to complete. Here, R attempts to close the call while P, in overlap, opens up further business.

As an example of a better call ending, Extract 5 shows how receptionists can remove the burden on patients by confirming appointment details.

(5) GP-143
R confirms P’s appointment details (lines 7-8). Some evidence for P’s satisfaction comes in her response “thank you very much”, in contrast to truncated “thanks” (Extract 1c, in which no appointment was made) or “thank you” (Extract 4, in which P had to push for confirmation). These internal measures of satisfaction are interesting: patients ‘thank’ receptionists in almost every call regardless of whether they have obtained the service they want, but more effusive thanks are present in more effective calls.

‘Patient burden’ and satisfaction

Conversation analysts identify, from the internal workings of interaction, (in)effective practice. ‘Patient burden’ and its resolution constituted (in)effective communication in patient-receptionist interaction. To provide external corroboration for these endogenous measures, we collected satisfactions scores from the GP patient survey for the three surgeries (https://gp-patient.co.uk), using the January 2015 survey due to temporal proximity of fieldwork with time of telephone recording. We focussed on two items: “X% describe their experience of making an appointment as good” and “X% find the receptionist at this surgery helpful”. 
GP3 had the fewest instances of patient burden (15/150 calls), followed by GP1 (28/149 calls) and GP2 (46/148 calls), respectively. The difference between the services regarding patient burden was statistically significant ($X^2 = 16.337$, df = 2, $p<0.001$). Comparing the relative frequency of ‘patient burden’ across three surgeries, we found a strong association with the independent patient satisfaction scores. Figure 1 shows that GP3, with the lowest ‘patient burden’, scored the highest on the survey (88% for “experience of making an appointment”; 97% for “finding the receptionist helpful”), followed by GP1, with more ‘patient burden’ (82% for “experience of making an appointment”; 91% for “finding the receptionist helpful”) and GP2, with the most ‘patient burden’ (59% for “experience of making an appointment”; 82% for “finding the receptionist helpful”).

Figure 2. Satisfaction scores from the GP patient survey, for three surgeries, compared with ‘patient burden’.
DISCUSSION

Summary

The main finding of this paper is that receptionists can increase or decrease the burden on patients to achieve service at the GP surgery. It identifies one aspect of what constitutes effective communication in general practice (GP) receptionists’ telephone encounters with patients. Less effective receptionists failed to offer alternative courses of action when they could not meet patients’ first requests, leaving the burden on patients to drive the call forward. They also closed calls prematurely, before confirming the details of next actions (e.g., the time and date of appointments). In the more effective calls, receptionists made alternative offers and summarized patients’ appointments or confirmed what would happen next. Higher frequency of ‘patient burden’ was associated with lower published patient satisfaction scores. Prior to conducting this study, we knew that surgeries offering basically the same service differed in their satisfaction ratings. But, without looking at the data, how would one know what made the difference?

Strengths and limitations

The study’s strengths are in its analysis of actual, real-time encounters to identify effective practice, rather than relying on post-hoc reports of or surveys about communicative encounters. Practitioners struggle to identify and action changes based on survey feedback alone [3]. Social scientists have shown repeatedly that accounts elicited in focus groups, surveys and interviews cannot reproduce interactional specifics.
[12] By instead focusing on real-time encounters we can fill the gap that exists between patients’ frustrations regarding access and often unreliable survey methods. [13] Although data were gathered from only three practices, what is identified as effective could well be relevant beyond them. In the future more statistically based studies, based on a larger group of surgeries, could further demonstrate the relationship between patient satisfaction and particular features of patient-receptionist encounters, and test the effectiveness of changing these encounters accordingly.

**Comparison with existing literature**

There are no other studies of patient-receptionist telephone inquiries, but a study of face-to-face front-desk talk found that receptionists are typically direct and task-focused, rather than rapport-building. [8] We argue that patients appear most satisfied when service is offered quickly and pre-emptively, rather than in response to pushing for it, which is a more specific finding.

**Implications for practice**

The study has implications for training receptionists. Key ‘trainables’ are to confirm appointment details or next actions at the end of calls and offer alternative courses of action if patients’ initial request cannot be met. Whereas existing training is broad and of little practical value [13], our work demonstrates how conversation analytic research can underpin such interventions. [14]
ADDITIONAL INFORMATION

FUNDING: The evaluation was funded by the Higher Education Innovation Fund via Loughborough University and by NHS North Derbyshire CCG.

ETHICAL APPROVAL: Consent was granted by the National Research and Ethics Service to use the calls for ‘service evaluation / improvement methodologies’, in line with national guidance, and the study was granted ethical consent from the research governance office at Loughborough University (ref.: C15-18).

COMPETING INTERESTS: None.

ACKNOWLEDGEMENTS: None.

REFERENCES


Table 2 (Appendix). Coding categories, the inter-rate reliability (Kappa) scores and p-values from chi-square tests comparing the three surgeries (significance level 0.05).

<table>
<thead>
<tr>
<th>Category</th>
<th>Labels</th>
<th>Kappa</th>
<th>X^2-test (p-value)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Does receptionist require caller to repeat any information at any point in the call?</td>
<td>2: No, Yes</td>
<td>0.82</td>
<td>No sig. difference p = 0.28</td>
</tr>
<tr>
<td>Does receptionist make an offer as part of the request response?</td>
<td>3: No, No + Offer, Yes</td>
<td>0.72</td>
<td>No sig. difference (offer vs. no offer) p = 0.62</td>
</tr>
<tr>
<td>How does the caller treat the receptionist’s response?</td>
<td>5: Silence, Acceptance, Problem accepting, Problem understanding, No opportunity</td>
<td>0.69</td>
<td>No sig. difference (Silence, Problem accepting/understanding vs. Acceptance or No opportunity) p = 0.32</td>
</tr>
<tr>
<td>Does receptionist offer an alternative or suggest a future action following an initial non-granting?</td>
<td>2: No, Yes</td>
<td>0.78</td>
<td>GP1 and GP3 more likely than GP2 to offer alternative: p = 0.007**</td>
</tr>
<tr>
<td>Who progresses request after receptionist’s first response?</td>
<td>2: Receptionist, Patient</td>
<td>0.84</td>
<td>GP3 more likely than GP1 and GP2 to progress call p &lt; 0.001***</td>
</tr>
<tr>
<td>Is there a problem about whether the task is complete when receptionist starts to close the call?</td>
<td>3: No problem, Problem (patient clarifies), Problem (patient closes down, receptionist re-opens)</td>
<td>0.73</td>
<td>No sig. difference (No problem vs. patient clarifies) p = 0.14</td>
</tr>
<tr>
<td>Does receptionist make a restatement of arrangements?</td>
<td>3: No (nobody does), Yes, No (patient does)</td>
<td>0.78</td>
<td>GP3 more likely than GP1 and GP2 to restate arrangements p = 0.003**</td>
</tr>
<tr>
<td>Does the receptionist say thank you first, in closing of call?</td>
<td>3: No (nobody does), Yes, No (patient does)</td>
<td>0.85</td>
<td>GP3 patients tend to say ‘thank you’ first more frequently than GP1 and GP2 (non-sig.) p = 0.07</td>
</tr>
<tr>
<td>Patient burden</td>
<td>2: Yes, No</td>
<td>0.78</td>
<td>More overall patient burden in GP2 compared to GP1, and in GP1 compared to GP3 P &lt; 0.001***</td>
</tr>
</tbody>
</table>