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### Evolution of the general practice receptionist role and online services: qualitative study

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#### **Abstract**

#### **Background**

General practice receptionists are perceived as the 'gatekeepers' to primary care services and are central to managing patient demand and facilitating patient care. This role is evolving and becoming increasingly complex in a digital world.

#### Aim

To consider the growing role of patient facing online services and the impact these have on the role of the general practice receptionist.

#### Design and setting

A focused ethnographic case study in eight general practices across England and 19 stakeholder interviews.

#### Method

Focused ethnographic case study and stakeholder interviews were conducted between September 2021 and July 2022.

#### **Results**

The receptionist role looks different across practices, but is now more varied and less repetitive than it has been historically. The volume of patients and number of channels by which patients contact the practice means that receptionists are dealing with increasingly complex demand management and navigation to appropriate services. This now includes online services, which has created a new element to the receptionist role – digital facilitation. The role is also largely navigated by the receptionists without any formal training and staff are mostly expected to learn on the job from other receptionists, leading to inconsistent practices.

#### Conclusion

The digitalisation of healthcare services impacts the workflow and consistency in task completion of general practice receptionist staff and has potential implications regarding job satisfaction and retention. In addition, the knowledge and skills required to fulfil this role are evolving and therefore may have recruitment and training implications.

#### Key words

General practice; medical receptionists; digital technology; focused ethnography; qualitative research

#### How this fits in

The introduction of online systems and services into general practice and the impact on general practice staff has been considered from a clinician perspective but comparatively little is known about the impact these have on the receptionist role. This study highlights that the use of online services is leading to an evolution of the general practice receptionist role. The role is becoming increasingly complex as practices use multiple online systems, which impacts demand management

and navigation aspects of the role. Online systems have variable consequences on workload for receptionists, which has potential implications for workflow, consistency of task completion, job satisfaction, and retention and recruitment of these key staff members.



#### Introduction

The general practice receptionist is one of the most 'visible' roles within the UK primary care workforce [1] and often the first point of contact for service users [2]. The patient-facing receptionist role is key to the running of general practice as they help manage demand and facilitate patient access to care [3-9]. They are often perceived as the 'gatekeepers' to primary care services and as a consequence may face hostility from patients [2, 4, 7, 9-12]. Historically, the receptionist role was centred around answering telephone calls, booking appointments, greeting patients, administering repeat prescriptions and filing [5, 13]. However, the development of digital technology and the introduction of triage approaches [9, 13-16] has meant the role of the general practice receptionist has evolved over time. Recent UK Government plans to tackle the 8am rush and to make it easier for patients to access primary care services recognises the developing role of the general practice receptionist as a care navigator and necessitating the development of new skills [17].

Digital transformation in the National Health Service (NHS) has long been promoted by policymakers. In 2018, a UK Government policy paper outlining a vision for digital, data and technology in health and care, included promoting online services and for NHS staff to feel empowered and confident in using technology [18]. However, the COVID-19 pandemic accelerated changes globally, with a rapid increase in the number of people using online services such as patient portals [19, 20], online prescription ordering [21], and remote consultations, particularly video and email [19, 22-27].

Implications of moving to online services have been considered in the literature from a clinician perspective (e.g. job satisfaction, administrative burden, flexibility of working) [19], but with comparatively little consideration for the impact of changes to the receptionist role in general practice [28]. One previous ethnographic study found that patients and staff felt that increasing the use of remote consultations would reduce pressure on reception staff; however, there was little evidence to suggest this was the case, and in some respects the workload of reception staff was increased [3].

This article draws on a team-based focused ethnographic study and interviews with stakeholders to examine the impact that online services have on the role of the general practice receptionist.

#### Method

This research was undertaken as part of a wider multi-method study on digital facilitation in primary care (the Di-Facto study) and full details of the methods used are published elsewhere [29]. For the purposes of the study, digital facilitation was defined as 'that range of processes, procedures, and personnel which seeks to support NHS primary care patients in their uptake and use of online services.' Reporting of this study is guided by Standards for Reporting Qualitative Research [30].

#### Qualitative design and context

A team-based focused ethnographic case study and interviews with key stakeholders were conducted between September 2021 and July 2022. The ethnography team consisted of five researchers: a day-to-day lead (JN), a senior lead (HA), and three ethnographers (SS, CB, BT) who worked in the field for up to six weeks in each case study practice. The stakeholder interview team consisted of four researchers: a day-to-day lead (EP), senior lead (HA) and two interviewers (BT, RW). Patient and public representatives (including CM) were involved throughout the Di-Facto study

from conception, through the design and conduct of the research, to the synthesis and interpretation of findings.

#### Research team

Researchers in the field (SS, CB, BT) were trained in observation techniques and were experienced qualitative researchers with varied previous experience of ethnographic approaches. They met fortnightly during data collection and met monthly with experienced researchers (HA, JN) . These meetings enabled discussion of the practical aspects of data collection and provided researchers space for reflexivity. Researchers were also encouraged to diarise their reflections with their fieldnotes and share these with team members.

#### Sampling and recruitment strategy

This study aimed to include a varied sample of eight practices across a range of primary care settings. Sites were identified through a previous element of the wider study which included a national practice survey [31] and via the National Institute for Health Research Clinical Research Networks. Sites were purposefully selected based on their experience and delivery of a variety of digital facilitation approaches and practice characteristics (e.g. practice location, index of multiple deprivation score at practice level, list size, percentage of patients aged >65 years). Stakeholders were identified through an initial stakeholder analysis (involving contact mapping using policy review, the research team's knowledge of the health system and patient and professional bodies, professional networks of the wider research team, and internet searches) and snowball sampling [32]. The aim was to recruit 12-18 stakeholders with oversight at a local, regional or national level on matters relating to digital facilitation.

#### **Ethical approval**

This study was granted ethical approval from the Newcastle & North Tyneside 2 Research Ethics Committee (June 2021, reference number:21/NE/0079) and HRA approval (July 2021, IRAS number:289425, protocol:L01886).

#### Data collection methods and procedure

Ethnographic data were collected from eight practices in four regions across England, which involved non-participant observations, document analysis, and interviews with patients/carers and staff. The duration of researchers' site visits varied depending on the prevalence of the phenomenon of interest (digital facilitation) and continued until no additional data was evident to the researcher across the data sources at each site, and disconfirming views had been obtained.

A case study guide was created (see supplementary file S1) to ensure consistency was maintained across the team at multiple sites in data collection. We have used this approach previously in teambased focused ethnography [33, 34].

Extensive handwritten fieldnotes with no identifiers or names were made by researchers and later digitised. Documents (e.g. posters, leaflets, newsletters) relevant to digital facilitation were collected with identifiable information removed, and written descriptions of these were added into the summarised fieldnotes template. As this was a team-based ethnography, we ensured that data was collated in a standardised format for analysis. This was achieved by using a separate document for each general practice, collating contextual information about each practice, summarised fieldnotes, listing details about who was interviewed and noting down documentation collected. These documents were updated throughout data collection.

Interviews with patients/carers, staff and stakeholders were conducted either face-to-face, via online video conferencing or telephone, and with the interviewees' permission, audio recorded. Separate topic guides (see supplementary file S2) were developed for staff, patient/carer and stakeholder interviews. These were informed by a review of the literature [35] and the survey of general practices [29]. The staff topic guide covered drivers for supporting online access in the practice, the type of support in use, the perceived success of this and challenges to implementation. The patient/carer topic guide explored use of online services outside of health, challenges to using online GP services, and participants experiences of digital support with the practice. The stakeholder topic guide explored key drivers of digital facilitation, perceptions of digital facilitation in practice, , concerns around digital inclusion and the evolving policy context.

#### Data processing and analysis

All interviews were audio recorded, professionally transcribed and checked for accuracy by the researcher who conducted the interview. Data from the focussed ethnography and stakeholder interviews were analysed together using reflexive thematic analysis [36] through the following steps: (i) reading transcripts and developing coding frames; (ii) agreeing a final coding frame at an analysis meeting that worked for all data source types; (iii) gathering related sections of transcripts, fieldnotes and documents under thematic codes; (iv) applying thematic analysis to each line of argument in the text, using the 'one sheet of paper' method [37] to create summaries of each code, and grouping codes into broader themes/axial codes from which themes were derived and summarised; (v) sharing findings with wider research team to finalise interpretation.

#### **Results**

#### **Practice context**

, patient ,rs spent 45 ... 33 patients/cal Practices varied in terms of their location, patient list size, proportion of ethnic minority patients,

Table 2) and 36 staff (length: 8-60 minutes) between September 2021 and July 2022 (

Table 3), and 19 stakeholders (length: 22-62 minutes) between October 2021 and May 2022 (



Table 4).

Table 1. Characteristics of included practices

Practice ID	List size*	Location	Ethnic minority patients %#	Patients ≥ 65 years %	Index of multiple deprivation score	Receptionist title in the practice
Α	Large	Semi-rural	4.2%	23.4%	10 (Low)	Receptionist
В	Small	Urban	85.7%	7.3%	1 (High)	Receptionist
С	Medium	Urban	40.0%	9.4%	3 (High)	Receptionist
D	Large	Urban	1.5%	23.9%	9 (Low)	Receptionist
E	Large	Rural	1.8%	8.3%	5 (Medium)	Care advisor
F	Large	Rural	1.2%	33.4%	6 (Medium)	Patient care advisor
G	Large	Urban	6.4%	19.6%	8 (Low)	Receptionist
Н	Small	Urban	1.0%	14.7%	2 (High)	Patient care advisor

<sup>\*</sup>small < 6,000; medium 6,000 – 12,000; large > 12,000 patients.

<sup>#</sup> Including Asian/Asian British; Black/African/Caribbean/Black British; Mixed; White; Other ethnic group as reported on fingertips.phe.org.uk.

Table 2. Characteristics of interviewed patients/carers

Characteristics		Number of participants (total = 33)
Gender	Female	18
	Male	15
Age group	18 – 24	2
	25 – 34	3
	35 – 44	4
	45 – 54	5
	55 – 64	6
	65 – 74	6
	75 – 84	4
	≥ 85 years	2
	Undisclosed	1
Ethnicity	White British	26
	Asian	6
	Black Caribbean	1
Health	Long term condition(s)	13
	Disability	1
Carer	Yes	7
	No	26

Table 3. Characteristics of practice staff interviewed

	4 4 2	
Characteristics		Number of participants (total = 36)
Gender	Female	23
	Male	13
Age group	18 – 24	3
	25 – 34	10
	35 – 44	7
	45 – 54	7
	55 – 64	4
	≥ 65 years	1
	Unknown	4
Role in practice	Practice manager	8
XO	Receptionist	6
20	Reception manager	1
607	Administrator	2
	Data/IT/QC/Business manager	4
	GP	8
7	Nurse/Health Care Assistant	3
	Paramedic	1
	Clinical pharmacist	2
	Social prescriber	1

Table 4. Characteristics of interviewed stakeholders (n = 19)

Organisation type	n	Level	n	Clinical/non-	n	
				clinical		
NHS infrastructure	9	National	11	Clinical role	10	
Third section organisation	7	Regional	5	Non-clinical	9	
		Local	3	role		
Academia	2					
Provider of digital platform	1					_

We identified five themes that highlight the varied, integrated role of the receptionist. The interconnection of these themes are illustrated in Figure 1. The complexity of demand management that online services create directly feeds into the variable role of the receptionist, who then must help navigate patients towards the appropriate care. This, in some instances, may require navigating patients to online services, which can create an additional element in the receptionist role of digital facilitation. This is largely done with minimal formal training and support.

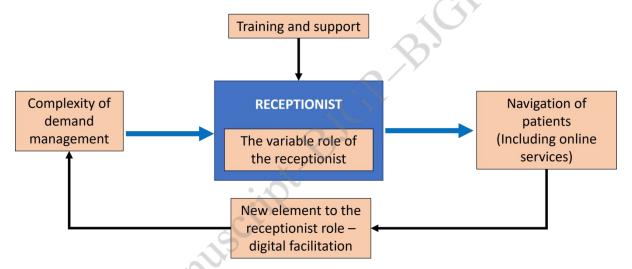


Figure 1. Themes identified highlighted the varied and integrated role of the receptionist

#### The variable role of the receptionist

The receptionist role is highly variable between practices, and understanding of the role is inconsistent even within individual practices. Tasks undertaken by receptionists depended on whether the practice had specific administrators (e.g. prescription clerks, IT officers), the number of receptionists, and the confidence and competence of the receptionists themselves. The volume of different tasks now undertaken by receptionists means the job is perceived to be more varied:

"It's changed, whereas it was very repetitive, there is more variety because we are doing lots of different jobs compared to a few of the same jobs." (Practice C, Receptionist).

Some practices were highly structured, with rotas for which receptionists were responsible for specific tasks in blocks of time that would rotate. Others had greater flexibility in that receptionists would, on the day, allocate tasks for blocks of time.

#### Complexity of demand management

The role is "not just a case of answering a phone" (Practice F, Receptionist) as there are now multiple routes patients can use to access general practice that are monitored by receptionists. Online channels such as email, online triage tools, practice websites and specific apps are used, some of which were easier for reception staff to navigate than others. Many of the online routes were intended to reduce call volumes:

"the reality is that people can't get through on the telephone and there aren't enough receptionists." (Stakeholder 03).

However, reception staff commented that this has not reduced their workload rather it is the same workload spread through different channels:

"Same patients will email that used to phone all the time" (Practice A, fieldnote).

Some patients were unaware that receptionists also dealt with online requests, and they believed they were bypassing the receptionist:

"Well, so it [email] gets to the horse's mouth rather than the receptionist" (Practice A, Patient 02).

However, in some cases patients were understanding that the reception teams were extremely busy managing the online communication streams. Practices also controlled demand by switching off online access platforms in variable fashion:

"I think if we didn't turn the eConsults off at 11 we'd have a lot more" (Practice E, Lead Practice Nurse).

#### **Navigation of patients**

Acting as a navigator was a key element of the receptionist role in the participating practices. Reception staff promoted online routes to accessing services, especially when there were no more appointments available for those calling the practice. This avoided the patient needing to call back. Some practices reserved appointment slots for those using online services, and so reception staff could navigate patients via online routes to offer them an appointment.

It was observed that reception staff sometimes appeared stressed, and staff acknowledged the role can be stressful, especially around peak times for patient demand, or when appointments have run out for the day, or when patients are frustrated and short tempered:

"it was a typical Monday morning, the phones didn't stop ringing and many patients came in. The receptionists were all quite stressed, including one who I never see stressed!" (Practice D, Fieldnote).

Online services could be helpful in placating patients by providing an alternative route to access services, reducing stress for receptionists:

"we used to get a lot of patients that were very cross with us, because they couldn't get appointments with the doctors they wanted. But now we can say, 'Do an e-consult with 'named' doctor and they'll get back to you' [...] So it, sort of, calms them down a bit." (Practice E, Care Advisor)

#### A new element to the receptionist role – digital facilitation

There was a perception from stakeholders and some general practice staff that enabling patients to self-serve using online services meant that workload relating to patients was consequently reduced for reception staff. Patient queries can now be answered directly by information on the apps and websites and patients can in many cases access information from their own medical record online.

These benefits to workload were dependent on patients being able to use online services. There were concerns that introducing online services may lead to more queries e.g. when accessing their medical record for the first time. It was evident that the introduction of online services was reshaping the role of the receptionist:

"So I end up ringing the GP [receptionist] and she, I put her on loudspeaker and then she explained what I had to click on and from that day I know how to do it now." (Practice H, Patient 02).

Responsibility for supporting patients to use online services was regarded by staff, patients and stakeholders as the role of the receptionist, and they appeared to be expected to absorb it within their role.

"I don't know whether other GPs are doing it more than, than me. I think, our time is so precious when we're talking to patients... it's not something that I tend to get involved with. I would tend to refer them to the reception team to go through that side of things." (Practice A, GP Partner)

This extra role came with complications. Patients may use the online systems incorrectly which creates extra work for the reception team to reconcile. For example, with online appointment booking, patients were able to select inappropriate appointment slots which then had to be rescheduled by receptionists, something they would have done anyway and thus not saving them any work:

"During the pandemic, the practice made the decision to stop the online appointment booking facility and has since remained off.[...] This was because patients booked appointments in unsuitable slots (e.g., a blood test with a GP instead of a phlebotomist or nurse). The receptionists used to monitor online bookings." (Practice F, fieldnote)

In other instances, receptionists perceived an increase in their workload where patients made attempts to work around the system or where they lacked understanding of how to use the systems:

"there's just too many slots, really, for the patients to access us. And it's not always the correct one. It could be, they may put something in 'ask the practice a question', when really, it's a repeat prescription request. [...] But at the moment we have to look in everywhere else like, 'ask the doctor a question'. 'Ask the nurse a question'. 'Ask the practice a question'. 'Ask reception a question'. [...] So, it does, that wastes a lot of our time." (Practice G, Prescription Clerk)

Duplication of contacts by patients reflected a lack of patient confidence in the online systems and this led to duplication of effort to the detriment of patients and staff:

"had somebody do an e-consult the other day, who then emailed the surgery to say, 'I've done an e-consult' and then phoned the surgery, so that's three lines of doing admin!" (Practice G, Quality and Performance Manager)

These examples were seen as evidence that there was a need for patients to be supported to understand how to use the online services in the way they were intended to be used, and that some systems are not as user friendly. This role fell to reception staff.

#### <u>Training and support for receptionists</u>

A consequence of this change to receptionist role was the need for training and support. It was acknowledged by staff and patients that individual receptionists have different skill sets and abilities when it comes to online systems and ways of working. Whilst there were instances where it was possible to match skill sets to tasks among existing staff, extra training and support was also needed to upskill those who needed it so that they are able and confident to fulfil their roles:

"you'll have members of staff who are confident to do that. Others not confident, and so you don't want them doing it. And it's, again, it's about how you, we train up and develop those receptionists to act as not just receptionists and booking appointments, but to start filtering the work to various people." (Practice G, Practice Manager).

There was a perception that younger reception staff were more likely to feel more confident using and troubleshooting technology, and therefore may be better placed to support patients:

"we're a bit older now, our work force downstairs, but we have the youngsters who are really good, you know, you'd say, 'Oh, can you sort this out?'" (Practice E, Care Advisor).

However, in some circumstances receptionists' ability to understand the problem and support patients was limited by the online service being provided by a third party:

"The receptionist said 'we don't have any dealings with the NHS app'" (Practice H, fieldnote).

In addition, the evolving skill set receptionists now require was thought to be important to consider when hiring new staff, potentially changing recruitment in general practice:

"over time we've got to completely change the requirements of general practice reception and admin teams, what we expect from them." (Practice G, Practice Manager)

We observed a lack of formal standardised training and support provided to receptionists regarding using online services, with many learning on the job from other receptionists and through trial and error:

"I wouldn't say it's much training, it's more a sort of, like, we look at it ourselves and find out ourselves [...] A lot of it's self-taught." (Practice G, Receptionist).

In some cases, new systems were brought in and no training was provided. One member of staff indicated that this lack of training, time and resource was common:

"It's the way with the NHS, you get no training about anything. And so you just accept, you're expected to pick these things up and use them and know how to advise patients if they can't use them. [...] we haven't had any resources to do that. We've had no materials, no money really and no facilities to train staff unless we go out and find out own training materials." (Practice A, Practice Manager)

This non-standardised 'training' resulted in inconsistent messaging and service provision to patients:

"they'd just tell me different things each time I would call up because it would be somebody else at reception." (Practice B, Patient 05).

New staff reported confusion and concern about how to complete tasks if they had been shown by different people doing it different ways:

"Apprentice said it is 'nerve racking' for her. She has had some training from two different staff but both do it differently." (Practice B, Fieldnote).

Whilst, generally, receptionists were observed to be good at supporting each other when issues arose or showing new staff the systems, standardised training and policies would be valued.

Stakeholders, on the other hand, believed there was non-mandatory training available but that practices did not always take it up due to time pressures. In reality there was rarely protected time for receptionists to engage in this training and so it was done when it could be slotted in among other duties::

"I noticed one of the receptionists had received an email from the [NAME] App which was giving notice of the December update. [...] Receptionist 4 said she doesn't have time to read the update emails about the App." (Practice B, Fieldnote).

When training did occur, it would sometimes constitute an initial session for a new online service, provided by staff internally or technology providers, meaning that staff missing this or joining afterwards would not receive the training. There would also be mandatory courses relating to important concepts like information security. Resources for training were sometimes stored on internal drives at the practice, but use of these as training aids was largely not observed or reported during the study. There was one example where guidance was printed and a staff member used it to complete a task, indicating that if it is readily available then it is more likely to be used.

#### Discussion

#### Summary of findings

The receptionist role within general practice has evolved and become more complex. In our study, the role appears to be different across practices and there appears to be some tailoring of tasks to suit individual skill sets which happens organically, especially in relation to online services. The role is prone to external influences meaning receptionists lack control over what their role is; for instance, online services are potentially reshaping the receptionist role by changing patient behaviours.

Receptionists are managing multiple modes of communication from patients, and patients lack awareness that online services have been absorbed into this role. The complexity extends to navigation as there are several options available when patients make contact, including referring patients to online services. This has created a new element to the role which involves supporting patients to self-serve via online services. If used by patients as they were intended it reduced workload for the receptionist; however, when used incorrectly it increased workload. The role was regarded as sometimes stressful, particularly when dealing with frustrated patients, but online services provided options to placate patients.

The changing role, particularly in respect of online opportunities, is largely navigated by the receptionists without formal training and staff are mostly expected to learn on the job from other

receptionists. There was a general lack of instructional documentation that could be used by staff, and in cases where it did exist, reception staff were largely unaware of it. This led to inconsistencies in practice between staff, which sometimes frustrated patients.

#### **Strengths and limitations**

A strength of this work is the range of data sources used as part of the focussed ethnographic case study, which allowed researchers to triangulate information and delve deeper into inconsistencies that utilising a single method would not have achieved. In addition, the eight practices included a variety of geographic locations and socio-economic demographic characteristics of England as a whole and of the populations they served. Stakeholder interviews provided views beyond individual practices and greater context.

A limitation of this study was that the ethnographic research was conducted during the latter period of the COVID-19 pandemic, which may have impacted patient flow and the receptionist tasks, which may not continue in the same way. In addition, due to the focus of the work, no data was sought on job satisfaction, retention or wellbeing of reception staff, which would have provided greater insight into the impact of online services on this role. However, a recent ethnographic study reported receptionists 'performing' their role as if on stage, hiding their true identities behind customer service and inflexible digital policies, with many leaving their job because digitalisation had led to increased workload and hostile working conditions [12]; and this study did not consider the additional task of digital facilitation.

#### Comparison with existing literature

The current state of general practice provided important wider context for the findings of this study. Staff in the study had noticed a growth in patient numbers and perceived a corresponding increase in their workload. Consultation rates have increased by 15% since 2018-2019 to when the data in the present study was collected in 2021-2022 [38]. The impact of the COVID-19 pandemic was still felt at the time of the fieldwork with increased workload relating to vaccinations and Covid passports, and some practices experienced staff shortages. Increasing demands for general practice services without capacity to meet this demand is a national issue for the UK [39]. Central to the NHS England plan to manage demand by tackling the '8am rush', and within the 2023/24 GP contract, is to avoid telling patients to call back at a later time [17, 40]; however, we observed this already happening in practices with many receptionists recommending patients access via online services instead of calling back.

The receptionist role is complex, demanding, and stressful [11, 41] and involves high levels of task and skill variety and also information processing [42]. The present study suggests that the evolution of online services may actually amplify this. There are few studies reporting the effects online services have specifically on the general practice receptionist role and this article contributes to the literature by addressing this gap and explicitly acknowledging the task of digital facilitation within the receptionist role. Previous work on alternatives to face-to-face consultations in general practice suggested that the introduction of any new technology can be highly disruptive to practices, in terms of organisational, professional and spatial disruptions and dynamics, and can also have unintended consequences [28]. From this study for instance, patients making multiple contacts and inappropriately using online services required extra administration and coordination between staff.

Similarly, a recent ethnographic study found that the digitalisation of UK general practice facilitates increased access, which for some patients can lead to excessive use and a supply-induced-demand [12], which receptionists often have to manage. However, there were also cases in the present study where technology streamlined tasks, for instance the ability to send mass text messages or links to online services, also found in the ethnographic study [12]. This reflects that digital approaches are more likely adopted when they serve a purpose and meet a need [43, 44].

Previous research suggested that the receptionist role began changing before the COVID-19 pandemic with services moving towards a more remote online model, which required some receptionist teams to be re-trained, resulting in some leaving because they no longer enjoyed the role [3]. In the 1980's many general practice receptionists did not undergo formal training and the majority learned on the job from other reception staff, practice managers or sometimes clinical staff [4, 5], and for some aspects and/or individuals in the role this largely remains the case 40 years later [3, 9, 11, 13, 42]. The rapidity of changes required due to the COVID-19 pandemic, especially related to online services, may have resulted in training being bypassed or fast tracked [19], which may be a contributing factor in the present study. There is a need to recognise, formalise and support the receptionist role in remote-triage and care navigation [13, 17, 45], which considers the multiple channels by which patients can now enter general practice. A lack of time and funding were commonly mentioned barriers to training for receptionists in the present study and previous research [13, 45].

#### <u>Implications for practice, policy and research</u>

The evolving role of the general practice receptionist requires skills and capabilities to competently use and monitor multiple online services to manage patient demands and navigate patients towards appropriate services. Whilst the COVID-19 pandemic expedited the use of online services for some general practices, many continue to use them post-pandemic, indicating a lasting change. This may have implications for recruitment strategies for practices (e.g. job descriptions and skills requirements). Updated guidance on the role, expectations and skills requirements of receptionists may be helpful, especially as the role has potential to become more professionalised. For those newly recruited or already in post, more formal support and training for reception staff may be required, if even to standardise messaging and practices within a general practice, which requires further research. Future research is needed to investigate the retention, job satisfaction, workload and recruitment processes which may be appropriate in respect of the evolving role of receptionists. In addition, research looking at system level changes should consider the impacts of the changes on this role.

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# Supplementary File

# S1: Case study guide

### Objective of the case studies

- To explore in-depth the use of digital facilitation in general practices. Through nonparticipant observation, semi-structured interviews, and secondary analysis of documentation.
- Build a detailed picture to explore what approaches practices have taken to digital
  facilitation, why facilitation was introduced, how they have introduced and/or
  implemented their approaches, what has made this possible, and what the benefits
  and challenges have been from the perspective of staff and patients/carers.
- Changes in the provision of primary care as a result of COVID-19 have been extensive. The case studies will focus on the models of facilitation in place at the time of the research but will explore any changes made in the light of COVID-19.

We are interested in the following groups:

**Staff**: GPs, nurses, nurse practitioners, reception staff, practice manager, administrative staff and any other staff involved in digital facilitation.

**Patients and carers**: All patients aged 18 years and over. We are particularly interested in patients who have been targeted by or participated in efforts to increase uptake of online services.

Data collection will include:

- Non-participant observation to understand how digital facilitation occurs within the practice, with whom, and in what ways.
- Attendance at practice meetings.
- Collection of relevant data and documentation.
- Interviews

Findings from the literature review in WP1 have been used to develop a typology of digital facilitation. This typology will be a useful reference for the ethnographers in identifying types of digital facilitation that the practice staff and patients are interacting with.

Typology of dig	ital facilitation	Definition
Digital		Broad category of digital facilitation that captures ways of raising awareness of and knowledge about digital services, endorsements of specific digital services to patients, and methods of encouraging patients to use them.
facilitation aimed at patients	Training and education	Education or training to help patients acquire technical skills to use digital services or to help patients understand what features of a digital service can be most helpful to them.
		Ongoing help in using digital services provided by clinicians or other primary care staff to patients.
Digital facilitation aimed at primary care staff		Interventions aimed at primary care staff typically aim to increase staff's knowledge of digital services so that they can better support patients in their use of the services, or to increase their trust in services in order to increase the likelihood of staff promoting the service to patients.

**Reception Staff** 

Tasks	Per protocol approach	Factors to explore

- ObservationInterviewInformal conversations
- What facilitation takes place
   What devices are used to
- What devices are used to deliver facilitation (laptop/phone/tablet)
- How do barriers to facilitation present
- How are the barriers to facilitation overcome or not
- When is digital facilitation mentioned: include context
- Which type of facilitation is observed: promotion; training and education; guidance and support
- How is it decided which type of facilitation to offer?
- Do they signpost patients/carers to others in the practice or externally for help with digital services?
- How do they feel about their role in digital facilitation (including how well equipped they feel to perform this role)?
- What is their role in encouraging patients/carers to use digital services?
- How do they feel about this role as part of their job?
- Do they derive satisfaction from engaging in digital facilitation
- What were their perceived training needs? How have they been addressed in the past and now

- Create structured summary profiles (to be populated by asking relevant staff these specific questions)
- What types of digital services are provided by the practice
- What types of facilitation are routinely used
- How are patients signposted to the facilitation types and by whom
- Using the typology which models of facilitation are in use?
- How long have they been in use?
- Have there been changes since the start of the COVID-19 pandemic?
- What training have staff been given on digital facilitation?
- How does the whole practice support the use of digital facilitation – whose responsibility?

**Practice Managers** 

Tasks	Per protocol approach	Factors to explore
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- Interview Observation Informal conversation
- Types of digital services offered and when.
- Types of facilitation.
- Responsibility for facilitation strategy
- Strategy evaluation and resulting changes.
- Targeting of different groups in the practice population.
- Perceived benefits of new services.
- Barriers to use.
- Impact of facilitation efforts.
- Changes seen since COVID-19 pandemic

- Who made decisions on the introduction of digital services?
- What were the drivers that led to the introduction of these services?
- What are the differences in uptake between patient groups in practice?
- Do the practice actively work with certain patient groups to improve uptake? What are their criteria for doing so i.e.do they target those where uptake should be easier or those they know are falling behind in terms of uptake?
- How are different types of digital facilitation applied?
- Who makes decisions on facilitation methods?
- Is digital facilitation seen as a whole staff issue or some members of staff more responsible?
- Does facilitation involve anyone beyond practice staff? Do they consider what other practices do?
- How are digital facilitation strategies discussed at practice meetings?
- What are the perceived benefits of different types of digital facilitation and for whom
- What were managers' perceived training needs? How have they been addressed in the past and now?

- Create structured summary profiles
- What types of digital services are provided by the practice
- What types of facilitation are routinely used
- How are patients signposted to the facilitation types and by whom
- What types of digital facilitation used most actively?
- How has this changed over time?
- How have staff members been trained on facilitation?
- What changes have been implemented since COVID-19 pandemic?

m ot or in	eview practice eeting minutes and her documentation online service troduction and gital facilitation	<ul> <li>Review notes and minutes from practice meetings where online services or digital facilitation is discussed.</li> <li>Review policies for the introduction and use of online services and digital facilitation strategies.</li> <li>Look for any templates, protocols or scripts used to automate patient engagement</li> </ul>	
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# GPs

Tasks	Per protocol approach	Factors to explore
Interview     Observation     Informal conversation	<ul> <li>Types of online services they encourage patients to use</li> <li>Clinician's perspectives on the importance of using online services and how digital facilitation aids this.</li> <li>Benefits of the use of online services for different patient groups</li> <li>Benefits to staff of more patients using online services</li> <li>Facilitators to using different types of digital facilitation</li> <li>Barriers to using the different types of digital facilitation</li> <li>Assumptions about who would use services or benefit from digital facilitation</li> <li>Importance of outcomes from digital facilitation.</li> <li>Characteristics of GPs that might affect their promotion of online services or digital facilitation.</li> <li>Explore how GPs record their signposting to online services and digital facilitation.</li> </ul>	facilitation are suggested by the GP to different patient groups?  Do GPs feel invested in helping their patients use online services? If so, which do they help with the most?  What are the barriers and facilitators to successful digital facilitation?  Do GPs feel it is part of their job to facilitate their use or signpost to those who can facilitate their use?  How does the use of online services impact

• Interview • Observation • Types of online services they encourage patients to use. • How do they feel about promoting online services.
• Informal conversation      • Models of facilitation used to help patients use the services.     • Facilitators to engaging with digital facilitation.     • Barriers to engaging with digital facilitation.     • Nurse perception of digital facilitation and online services.     • Nurse perception of appropriate patient groups to engage with digital facilitation.     • Assumptions about who would benefit from digital facilitation.     • Facilitation tried and success of different types of facilitation.     • Importance of outcome of digital facilitation of limpact on workload     • Explore views on responsibility for digital facilitation     • Impact on patient clinician relationship     • Explore impact of COVID-19 pandemic.  **Models of facilitation.  **Nurse perception of digital facilitation do they engage with digital facilitation about who would benefit from digital facilitation.  **What has been succe less successful in reladigital facilitation and online service use on their relationship watients?  **What outcomes of digital facilitation on they fee important and why?  **What are their assum, about who would benefit from digital facilitation and online services.  **Invariant has been succe less successful in reladigital facilitation on they does digital facilitation and online service use on their relationship watients?  **What outcomes of digital facilitation on they fee important and why?  **What are the facilitation about who would benefit from digital facilitation?  **What has been succe less successful in reladigital facilitation on they fee important and why?  **What outcomes of digital facilitation on their relationship watients?  **What outcomes of digital facilitation on their relationship watients?  **What are their assum, about who would benefit from digital facilitation on they benefit from digital facilitation on they been addressed past and now?

# Administrative staff

Tasks	Per protocol approach	Factors to explore
	-       -	

- Interview
- Observation
- Informal conversations
- Involvement in digital facilitation
- Mechanisms by which they are approached by patients for help with online services.
- Extent to which they feel digital facilitation is part of their role

- How do they deal with patient requests for online services?
- Are they involved in any digital facilitation?
- Do they see digital facilitation as part of their role?
- To what extent do they understand the purpose and different types of digital facilitation?
- How engaged are they with the practice strategy on online service use and digital facilitation to enable this?
- Has the COVID-19 pandemic impacted their work in relation to digital facilitation?
- What is the dynamic between admin staff and clinical staff in relation to digital facilitation?
- What were their perceived training needs? How have they been addressed in the past and now?

Social prescribers

Interview Observation Informal conversations  Informal conversation information in services  Information to expense on conversation in any digital facilitation?  Informal conversation in any digital facilitation?  Informal conversation in the practice?  Information in services.  Information to expense on they involved in any digital facilitation?  Informal conversation in the practice strategy on online service strategy on online service use and digital facilitation?  Informal conversation in the purpose and information in the purpose and information in any digital facilitation?  Informal conversation in the practice strategy on online service use and digital facilitation?  Informal conversation in the purpose of digital facilitation?  Informal convers	Social prescribers		
• Observation • Informal conversations  • Mechanisms by which they are approached by patients for help with online services. • Mechanisms by which patients are signposted to them for digital facilitation. • Extent to which they feel digital facilitation is part of their role • Assumptions about who would benefit from digital facilitation. • Facilitation tried and success of different types of facilitation. • Importance of outcome of digital facilitation to patients and the practice • Explore impact of COVID-19 pandemic.  • Assumptions about who would benefit from digital facilitation? • How engaged are they with the practice strategy on online services? • Are they involved in any digital facilitation? • How does digital facilitation fit with other roles in the practice? • Do they see digital facilitation as part of their role? • To what extent do they understand the purpose and different types of digital facilitation? • How engaged are they with the practice strategy on online services?			·
	<ul><li>Observation</li><li>Informal</li></ul>	facilitation  Mechanisms by which they are approached by patients for help with online services.  Mechanisms by which patients are signposted to them for digital facilitation.  Extent to which they feel digital facilitation is part of their role  Assumptions about who would benefit from digital facilitation.  Facilitation.  Facilitation tried and success of different types of facilitation.  Importance of outcome of digital facilitation to patients and the practice  Explore impact of	patient requests for online services?  Are they involved in any digital facilitation?  How does digital facilitation fit with other roles in the practice?  Do they see digital facilitation as part of their role?  To what extent do they understand the purpose and different types of digital facilitation?  How engaged are they with the practice strategy on online service use and digital facilitation to enable this?  What is the dynamic between different members of staff and digital facilitation?  Has the COVID-19 pandemic impacted their work in relation to digital facilitation?  What were their perceived training needs? How have they been addressed

**Practice champions** 

work in relation to digital facilitation?  • What were their perceived training needs? How have
they been addressed in the
past and now?



# Patients/Carers

Tasks	Per protocol approach	Factors to explore
• Interview • Observation	<ul> <li>How do patients engage with different models of digital facilitation.</li> <li>Discuss the barriers and facilitators to using online services.</li> <li>Explore the perceived advantages and benefits to them of being able to access services online.</li> <li>Understanding about changes brought in over the past few years and how has this impacted their use of the general practice.</li> </ul>	<ul> <li>How much are patients aware of the different online services and which are used most frequently? (This should be asked for contextual information not as focus of discussion.)</li> <li>Did they experience any difficulties in accessing online services?</li> <li>If so, how did they go about getting help? Did anyone do it with them – family member or in practice?</li> <li>Who in the practice helped them get online?</li> <li>In what form was that help?</li> <li>Were they targeted for help although they had not asked for it because of a particular characteristic?</li> <li>Looking at all the models of digital facilitation used in the practice which were the patient aware of and which had they used?</li> <li>Which models of facilitation were most useful and in what circumstances?</li> <li>Now that you can access online services, what are the advantages of using online services? How did digital facilitation help with this?</li> <li>Explore feelings of trust in the person at the practice that signposted both the online service and digital facilitation?</li> <li>Look for issues of privacy and confidentiality and explore what they mean by these things.</li> <li>Assess whether the patient was aware that they received facilitation (use appropriate terminology).</li> <li>Where they have not used digital facilitation and/or online services, why is that?</li> </ul>

# Vulnerable groups

Tasks	Per protocol approach	Factors to explore
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- Interview
- Observation
- How do patients engage with different models of digital facilitation.
- Discuss the barriers and facilitators to using online services.
- Explore the perceived advantages and benefits to them of being able to access services online.
- Understanding about changes brought in over the past few years and how has this impacted their use of the general practice.
- How much are patients aware of the different online services and which are used most frequently? (This should be asked for contextual information not as focus of discussion.)
- Did they experience any difficulties in accessing online services?
- Do they recognise themselves as being someone who might benefit from digital facilitation or face particular barriers to online services?
- If so how did they go about getting help? Is this from family/friends other sources?
- Who in the practice helped them get online?
- In what form was that help?
- Were they targeted for help although they had not asked for it because of a particular characteristic?
- How do they feel about being sought out for help?
- Looking at all the models of digital facilitation used in the practice which were the patient aware of and which had they used?
- Which models of facilitation were most useful and in what circumstances?
- Now that you can access online services, what are the advantages of using online services? How did digital facilitation help with this?
- Explore feelings of trust in the person at the practice that signposted both the online service and digital facilitation?
- Look for issues of privacy and confidentiality and explore what they mean by these things.
- Assess whether the patient was aware that they received facilitation (use appropriate terminology).
- Where they have not used digital facilitation and/or online services, why is that?

# S2: Interview topic guides

#### Staff interviews

1. Can you tell me your role at the practice?

If GP – are they a partner? If nurse – HCA, practice nurse, nurse practitioner?

Admin staff – what is their role – do they work on reception at all? How long have they worked at the practice?

- 2. Can you tell me a bit about the practice and the population that you serve? What does a typical day in the practice look like for you?
- 3. Can you tell me about the online services the practice uses? Which are you involved in?

Medication ordering Booking appointments Obtaining test results Messaging the GP/using online consultation Other

4. Can you tell me about your views and experience of getting patients or carers to use online services at your practice?

Do you know what proportion of patients at the surgery access services online?

Do you encourage patients to access services online? How you do you feel about doing this? For which sorts of services; ordering medication, booking an appointment, messaging a health professional, uploading a photo to a health professional.

5. What are the reasons the practice encourages patients to access online GP services?

Patient demand

COVID-19 pandemic

Policy initiatives which have encouraged practices to do so

GP contract requirements to do so

Does greater use of online services impact on how you can run the practice – for example freeing up administrative time, avoiding lots of demand first thing in the morning?

Are there any barriers to doing this?

6. Does the practice have a specific approach to helping patients and carers to access online GP services?

If yes can you tell us a bit more about that? What does that look like? If not, is this something done by all professionals in the practice or some? Where does it sit in list of priorities?

Can you tell us something about the patients you support to use online GP services?

What sorts of patients do they tend to be?

What factors impact on online access to GP services – disability, age, ethnicity, English as not the first language, access to devices, adequate internet access?

Do you feel more confident supporting certain groups over others?

Are the patients you provide support to different from the patients you encourage to use online services?

8. I want to ask about some of the ways in which the surgery has helped to get patients and carers to access GP services online. What help has the practice given patients? Who has provided that support – staff? PPG members? Other? How successful have you found efforts to get patients to use online GP services have been? What has helped in getting patients to use online services?

9. What challenges have you encountered trying to get more patients online?

Time/ resource?

Do practice staff have the skills/resources to deliver this?

COVID-19 restrictions or impacts on practice resources?

Lack of national guidance or support in how to do it?

Patients are not willing to receive such support?

10. Is there anything else we have not discussed which you'd like us to talk about?

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#### Patients/Carers interviews

1. I'd like to start by just asking generally about how you use online services currently. Do you use online services for things like shopping, banking or chatting with family or friends?

How do you feel about using online services?

- 2. Thinking now about your GP surgery, how long you have been a patient at the XX (name of practice) surgery?
- 3. How often do you tend to use the GP surgery?
- 4. Do you know which online services your GP surgery offers to patients? After leaving the interviewee to think: Prompt (depending on what you know is

available at the surgery)
Ordering medicines online
Making appointments online
Having a consultation online
Messaging a doctor or other professional
Uploading photos

5. Which of the online services available at your practices have you used?

Ordering medicines online
Making appointments online
Having a consultation online
Messaging a doctor or other professional
Uploading photos

- 6. How often do you use these services?
- 7. What are your main reasons for using online services from your GP surgery?

  Were you encouraged by someone else, if so who?

  How easy is it to navigate things from the surgery not online e.g. to get through on the telephone, or to get a face to face appointment?

  Has COVID-19 changed things, not being able to visit the practice in person?
- 8. How do you feel about going online to access services from your GP?

  Have you done so? What did you do?

  How did you find it?

What device did you use?

Does anyone help you when you do this?

9. Are there things that affect whether and how you access online services?

Personal factors – e.g. sight difficulties

Technology factors – e.g. lack of device, lack of internet access, problems with internet access

The process of registering for online services

10. Have you had any help from the practice in getting online? Can you describe the help that you have received?

> What was nature of the help? Who was it with? - member of GP staff, PPG member etc. How useful was the help that you had? Have you since accessed services for your GP surgery online since this help? If yes- how did you find this?

11. Do you feel that more help from your GP surgery would be useful in accessing online GP services?

> If so, can you describe what sort of help would be useful from your practice to support your use online services?

If yes – what sort of help would be useful? From whom, and in what ways?

a have no 12. Is there anything else about online services which we have not talked about, but you

#### Stakeholder interviews

### 1) Participant's current role

These questions will seek to understand more about your experience and role in relation to online services in primary care.

- Can you tell me what your current role/job is and what that involves?
- What responsibilities or interest do you have with respect to digital services in primary care? (prompt: can you say a bit more about where relevant)
- Have you had any previous jobs/roles relevant to understanding the use of digital services in primary care? Can you say a bit more?

# 2) Digital services in primary care

These questions will attempt to understand how you feel about current and changing use of digital services in primary care, the drivers for this and what may be the priority for increasing use of digital services.

- Can you tell me how you feel about the current use of digital services in primary care? How do you feel this has changed over time?
- What are the priorities within your role for increasing use of digital services in primary care? Why is this important?
- What are the drivers for trying to increase the use of digital services in primary care? (prompt: pre/post COVID-19; specific policies/agendas; professional drivers; patient drivers; resources) Which of these do you feel are most important just now/in your areas? Why?

# 3) Increasing uptake for digital services in primary care

In this section we are interested in views about what is being done to support patients and carers access to use online services or to support staff to help patients and what else you think could be done. This will include a discussion of the challenges that you think general practices face.

We have been interested in this study in understanding different models of 'digital facilitation' where general practices take specific steps to try to support patients, carers or staff to use online services.

- What do you feel are the main challenges for patients and carers in using online services in primary care?
- For what groups of patients and carers do you think it is most challenging to use commonly available online services in primary care? (prompt: particular challenges/groups)

### Policy level (as appropriate)

- Can you tell me what you know about what is currently done at a policy level to help staff, patients and carers access online services in primary care? Can you tell me a bit more about these (status of policy, target, aims)
- In your view, how successful have these policies been? Can you say a bit more? (prompts: from what perspective; evidence to support)

#### On the ground

- Practically, what do you know that general practices are doing to increase and support the uptake of online services? Can you talk about that a bit more/give examples? How effective do you think these efforts are? Why?
- Who has responsibility for ensuring increased uptake of online services in primary care and that particular group of patients and carers are not disadvantaged or excluded (prompts: responsibility at different levels – e.g. staff, practice, PCN, CCG, national)
- Who else do you think has an important role in trying to help to increase uptake of online services in primary care? Why?
- What do you think are the most significant challenges in trying to increase and support the uptake of online services? (prompts: equity, digital exclusion, types of services, COVID-19)
- What can be done to try to meet these challenges? Is there any change that you
  know of in relation to your role/wider policy that may impact on the uptake of online
  services in the future?

# 4) Future

This section aims to concentrate more on what can be done in the future (near/medium term).

- What would be your ideal vision for how online primary care services are used in the future? (E.g. 2/5 years' time) How confident are you that we will be in that position?
- If you could prioritise actions or resources to increase the use of online services what would you recommend? Why?
- What are the opportunities for change at these different levels we have discussed? (prompts: what needs to be done, what are barriers/facilitators around this)
- What will be important for future policy to address and consider in this area? Are there
  sufficient policy measures to address the concerns and challenges you have raised?
  Can you say a bit more? (prompts: on issues raised in previous questions, reasons for
  confidence or not, challenges for policy)

# 5) Tying up: other considerations

This section explores aspects of digital facilitation that we have not thought of or discussed so far.

- In talking about supporting patients and carers to make use of online services in primary care we have used the term 'digital facilitation' in our project which we define as: the range of processes, procedures and personnel which seeks to support NHS patients (or their carers) in their uptake and use of online services. Do you think digital facilitation a useful term? Do you have specific terms you use? Is there anything important missing from our definition?
  - Has this made you think of any other examples that we have not already discussed?
  - From our conversation so far, is there anything else that you think would be important for us to understand? Can you say a bit more?
  - In relation to national or regional actors and practice around digital facilitation is there anyone who you would feel is important to talk to? Why do you recommend?