PRIORITY BRIEFING

The purpose of this briefing paper is to aid Stakeholders in prioritising topics to be taken further by PenCLAHRC as the basis for a specific evaluation or implementation research project. They were complied in 2-3 days.

How can patient initiated clinics (PIC) be implemented for rheumatoid arthritis given the demonstration of the acceptability, effectiveness and cost effectiveness of such service organisation?

Question ID: 6
Question type: Implementation
Question: How can patient initiated clinics (PIC) be implemented for rheumatoid arthritis (RA) given the demonstration of the acceptability, effectiveness and cost effectiveness of such service organisation?

Population: People with RA who have had the disease for more than two years.

Problem: Patient follow up is traditionally managed by regular hospital reviews initiated by a physician. At PHNT, and anecdotally around the Peninsula and across the United Kingdom, there are delays in hospital follow up due to the number of appointments required. Often pre-booked reviews take place when the patient is well and little action is taken or needed. There is evidence supporting economical outcomes of PIC from the British Rheumatoid Outcome Study Group (BROSG) HTA 2005.[19]

Service and Setting: Medical services for people with RA require a multi-disciplinary approach involving both community and hospital based services. The specialist care for people with RA is generally hospital based, with appointment dates clinician driven. At PHNT and around the Peninsula the clinics happen in a range of central hospital and peripheral clinics.

Solution: Implementation of PICs using a multidisciplinary team including, but not limited to, managers, administrative staff, physicians, and specialist nurses. The end point of the current implementation program at PHNT will be that a majority of the people with RA cared for by the team at PHNT will have rapid access to secondary care when they or their GP feel that it is required, rather than the current traditional hospital clinician driven system.

Outcome: 1) Redirection of resources within rheumatology services. 2) Understanding of the barriers to implementing PICs. 3) Consultant appointment use - measure in the two years prior to the patient's entry into the PIC system, and then how the first and second years after follow up changed. 4. Satisfaction - measure patient (& GP) satisfaction with and confidence in the system (10 cm visual analogue scales). Additional subset outcomes and analyses are possible.

Patient Initiated Clinics:
Service provision would move from a clinician driven and inflexible follow up service for people with RA to one where people are seen when they request help and in a timely fashion. These clinics aim to improve immediate service responses to patients needing ongoing but fluctuating RA care. These clinics would be run by a multi-disciplinary team consisting of managers, administrative staff, physicians and specialist nurses in community and hospital based services. PICs should improve cost-effectiveness, improve patient, GP and rheumatologist satisfaction and reduce the delay in follow-up appointments.

Rheumatoid Arthritis:
Rheumatoid arthritis (RA) is a chronic disease that primarily affects the joints causing pain, swelling and inflammation. It most commonly begins between 20-40 years of age but can affect people of any age, and has unpredictable periods of inflammatory activity. RA is an autoimmune disease and frequently leads to bone erosion, reduced range of movement, fluctuating pain and psychological distress, and culminates in disability. Most people with RA require lifelong hospital follow up. There is no cure but early diagnosis or treatment can ease symptoms and progression.

The Health Problem
There are approximately 400,000 people with RA in the UK. The incidence of the condition is low, with around 1.5 men and 3.6 women developing RA per 10,000 people per year. This translates into approximately 12,000 people developing RA per year in the UK. The overall occurrence of RA is two to four times greater in women than men.

The economic impact of this disease includes direct costs to the NHS and associated healthcare support services, indirect costs to the economy, (including the effects of early mortality and lost productivity), personal impact of RA and subsequent complications for people with RA and their families. Approximately one third of people stop work because of the disease within 2 years of onset, and this prevalence increases thereafter. The total costs of RA in the UK, including indirect costs and work-related disability, have been estimated at between £3.8 and £4.75 billion per year. Clearly this disease is costly to the UK economy and to individuals. Patients with RA form about 50-75% of a rheumatologist's workload.

Guidelines:
NICE guidelines (2009) *Rheumatoid Arthritis: the management of rheumatoid arthritis in adults* recommend that people with RA should have access to a named member of the multidisciplinary team (for example, the specialist nurse) who is responsible for coordinating their care, should be offered the opportunity to take part in existing educational activities, including self-management programmes. They also recommend that people with satisfactorily controlled established RA be able to review appointments at a frequency and location suitable to their needs and in addition, make sure they have access to additional visits for disease flares and know when and how to get rapid access to specialist care.

The British Society for Rheumatology (BSR) guidelines state that patients need an individualised management plan including choices for long-term follow-up care, and that patients need rapid, self-initiated access to primary or secondary care including telephone advice. This supports the need for systems that promote self-management of care and treatment.

NHS Priority

<u>Regional</u>
SW SHA Priorities framework 2008-11

- Have a coordinated multi-disciplinary team approach for long-term conditions in each locality, with a single point of access. In this implementation the Specialist Nurse led Advice Line is the single point of contact for people cared for through the PICs
- 90% of admitted patients and 95% of non-admitted patients to be treated

within eight weeks

- By 31 March 2011, 90% of new patients referred by a general practitioner will be able to book appointments, diagnostic tests and treatments at times and dates convenient to them
- Improve the productivity of clinical activity. This implementation could reduce the follow up consultant consultations by about a third for those patients cared for in this manner.

Local

Local perspective

Although no local strategic frameworks make any specific reference to rheumatoid arthritis the following service aims apply to PICs:

- CPCT want to promote patients to manage their own illness wherever possible and to promote patient choice (and RCAT)
- DPCT aim to promote rapid access to assessment and treatment as well as self-management and care
- Plymouth Hospital also aims to promote responsive and flexible out-patient services

Existing Research

Published research

No systematic reviews have been found in this area. However, there are numerous studies looking at the impact of open access patient initiated follow-up clinics across many different areas of expertise (although not all are listed here), including lung cancer,[1] breast cancer,[2] diabetes,[3] urinary tract infections,[4] gastroscopy[7] and endoscopy[8] and several within rheumatoid arthritis.[5,6,9,10] Of the studies listed here all report positive effects resulting from the open access system in terms of patient care and satisfaction, cost-effectiveness and efficiency. There are also a number of studies that report barriers and issues that could prevent successful implementation of PICs.[11-18] Several studies[14] report that although some improvement was achieved in access to appointments the improvements were inconsistent. Same-day access to appointments was unsustainable, patient and staff satisfaction and no show rates also showed inconsistent levels of improvement. These studies also highlight concerns regarding the evidence of effectiveness for open access clinics as they claim the benefits published in these studies are not present after more rigorous evaluation. Some of the barriers reported to effect the implementation and effectiveness of open access clinics include: unexpected staff leave periods (leading to fewer reduced appointment availability),[14] prolonged planning stages resulting in less enthusiasm and resources for implementation,[14,11] and disagreement over appropriate goals.[14,17]

A similar system has been run in the Bristol Royal Infirmary[5] with promising results. In this study conducted over six years RA patients could initiate an

appointment by phoning a helpline run by Rheumatology nurse specialists – replacing the regular 3-6 monthly reviews initiated by rheumatologists. The helpline could give advice and arrange an appointment within 10 working days with the appropriate specialist/therapist. Results indicated that patients had more confidence and satisfaction with this way of working in comparison to routine follow-up.

Ongoing Research:
There were no records of ongoing research identified in this area to date.

Feasibility:
At PHNT a team including a patient partner (representing the National Rheumatoid Arthritis Society), an administrative clerk, a departmental manager, a rheumatologist, and specialist nurse are currently implementing Patient Initiated Clinics. At PHNT there are four full time consultant rheumatologists. PHNT serves a population of 460,000, and extrapolating from this figure it is estimated that there are about 4,500 patients with RA in the PHNT catchment area, of which 2,500 could be appropriate for PIC follow up.

References

1) Adlard, J. W., J. Joseph, et al. (2001). "Open access follow-up for lung cancer: patient and staff satisfaction." Clin Oncol (R Coll Radiol) **13**(6): 404-8.
The majority of patients with lung cancer have incurable disease from presentation and a survival measured in months. Treatments offered to these patients are aimed at the palliation of symptoms with either radiotherapy or chemotherapy, or with supportive measures. It has been traditional to offer regular outpatient follow-up after initial palliative treatment. Further treatment options, which may be limited, are usually reserved for the recurrence of troublesome symptoms. A pilot 'open access' lung cancer clinic has been set up. Rather than have regular follow-up at the hospital, patients who have completed initial palliative treatments are discharged to the community with follow-up by their general practitioner and Macmillan nurse. Review at the open access clinic can be arranged at short notice if requested by the patient, carers, general practitioner or Macmillan nurse. The outcomes and level of satisfaction of patients, their relatives and staff to this method of follow-up were found to be positive. Open access follow-up may be useful for many patients after the completion of initial palliative treatment.

2) Brown, L., S. Payne, et al. (2002). "Patient initiated follow up of breast cancer." Psychooncology **11**(4): 346-55.
This paper reports on a randomised controlled trial assessing two types of outpatient follow up for women previously treated for stage 1 breast cancer now in remission. These were standard clinic follow up (n = 31, age range: 48-83 years) and patient initiated follow up (n = 30, age range 53-87 years). The latter method involved giving the women written information on the signs and symptoms of recurrence and instructing them to telephone the Breast Care Nurse if they encountered any problems. The groups were compared in terms of cancer and breast cancer-specific quality of life, and psychological morbidity at recruitment, 6 months and 1 year. Satisfaction with follow up was assessed at 6 months and 1 year. Details regarding contact with healthcare professionals were collected at 1 year. There were no major differences in quality of life and psychological morbidity between the groups although more women in the standard clinic group reported reassurance and being checked as advantages whereas more women in the patient initiated follow up group reported convenience as an advantage. Patient initiated follow up is a potential alternative to standard clinic follow up for this group of women and appears to have no adverse effects. This could enable a cost saving to be made.

3) Dijkstra, R. F., L. W. Niessen, et al. (2006). "Patient-centred and professional-directed implementation strategies for diabetes guidelines: a cluster-randomized trial-based cost-effectiveness analysis." Diabetic Medicine **23**(2): 164-70.
AIMS: Economic evaluations of diabetes interventions do not usually include analyses on effects and cost of implementation strategies. This leads to optimistic cost-effectiveness estimates. This study reports empirical findings on

the cost-effectiveness of two implementation strategies compared with usual hospital outpatient care. It includes both patient-related and intervention-related cost. PATIENTS AND METHODS: In a clustered-randomized controlled trial design, 13 Dutch general hospitals were randomly assigned to a control group, a professional-directed or a patient-centred implementation programme. Professionals received feedback on baseline data, education and reminders. Patients in the patient-centred group received education and diabetes passports. A validated probabilistic Dutch diabetes model and the UKPDS risk engine are used to compute lifetime disease outcomes and cost in the three groups, including uncertainties. RESULTS: Glycated haemoglobin (HbA(1c)) at 1 year (the measure used to predict diabetes outcome changes over a lifetime) decreased by 0.2% in the professional-change group and by 0.3% in the patient-centred group, while it increased by 0.2% in the control group. Costs of primary implementation were < 5 Euro per head in both groups, but average lifetime costs of improved care and longer life expectancy rose by 9389 Euro and 9620 Euro, respectively. Life expectancy improved by 0.34 and 0.63 years, and quality-adjusted life years (QALY) by 0.29 and 0.59. Accordingly, the incremental cost per QALY was 32 218 Euro for professional-change care and 16 353 for patient-centred care compared with control, and 881 Euro for patient-centred vs. professional-change care. Uncertainties are presented in acceptability curves: above 65 Euro per annum the patient-directed strategy is most likely the optimum choice. CONCLUSION: Both guideline implementation strategies in secondary care are cost-effective compared with current care, by Dutch standards, for these patients. Additional annual costs per patient using patient passports are low. This analysis supports patient involvement in diabetes in the Netherlands, and probably also in other Western European settings.

4) Gupta, K., T. M. Hooton, et al. (2001). "Patient-initiated treatment of uncomplicated recurrent urinary tract infections in young women." Annals of Internal Medicine **135**(1): 9-16.
BACKGROUND: Recurrent urinary tract infections (UTIs) are a common outpatient problem, resulting in frequent office visits and often requiring the use of prophylactic antimicrobial agents. Patient-initiated treatment of recurrent UTIs may decrease antimicrobial use and improve patient convenience. OBJECTIVE: To determine the safety and feasibility of patient-initiated treatment of recurrent UTIs. DESIGN: Uncontrolled, prospective clinical trial. SETTING: University-based primary health care clinic. PARTICIPANTS: Women at least 18 years of age with a history of recurrent UTIs and no recent pregnancy, hypertension, diabetes, or renal disease. INTERVENTION: After self-diagnosing UTI on the basis of symptoms, participating women initiated therapy with ofloxacin or levofloxacin. MEASUREMENTS: Accuracy of self-diagnosis determined by evidence of a definite (culture-positive) or probable (sterile pyuria and no alternative diagnosis) UTI on pretherapy urinalysis and culture. Women with a self-diagnosis of UTI that was not microbiologically confirmed were evaluated for alternative diagnoses. Post-therapy interviews and urine cultures were used to assess clinical and microbiological cure rates, adverse events, and patient

satisfaction. RESULTS: 88 of 172 women self-diagnosed a total of 172 UTIs. Laboratory evaluation showed a uropathogen in 144 cases (84%), sterile pyuria in 19 cases (11%), and no pyuria or bacteriuria in 9 cases (5%). Clinical and microbiological cures occurred in 92% and 96%, respectively, of culture-confirmed episodes. No serious adverse events occurred. CONCLUSION: Adherent women can accurately self-diagnose and self-treat recurrent UTIs.

5) Hewlett, S., J. Kirwan, et al. (2005). "Patient initiated outpatient follow up in rheumatoid arthritis: six year randomised controlled trial." BMJ **330**(7484): 171. OBJECTIVES: To determine whether direct access to hospital review initiated by patients with rheumatoid arthritis would result in improved clinical and psychological outcome, reduced overall use of healthcare resources, and greater satisfaction with care than seen in patients receiving regular review initiated by a rheumatologist. DESIGN: Two year randomised controlled trial extended to six years. SETTING: Rheumatology outpatient department in teaching hospital. PARTICIPANTS: 209 consecutive patients with rheumatoid arthritis for over two years; 68 (65%) in the direct access group and 52 (50%) in the control group completed the study (P = 0.04). MAIN OUTCOME MEASURES: Clinical outcome: pain, disease activity, early morning stiffness, inflammatory indices, disability, grip strength, range of movement in joints, and bone erosion. Psychological status: anxiety, depression, helplessness, self efficacy, satisfaction, and confidence in the system. Number of visits to hospital physician and general practitioner for arthritis. RESULTS: Participants were well matched at baseline. After six years there was only one significant difference between the two groups for the 14 clinical outcomes measured (deterioration in range of movement in elbow was less in direct access patients). There were no significant differences between groups for median change in psychological status. Satisfaction and confidence in the system were significantly higher in the direct access group at two, four, and six years: confidence 9.8 v 8.4, 9.4 v 8.0, 8.7 v 6.9; satisfaction 9.3 v 8.3, 9.3 v 7.7, 8.9 v 7.1 (all P < 0.02). Patients in the direct access group had 38% fewer hospital appointments (median 8 v 13, P < 0.0001). CONCLUSIONS: Over six years, patients with rheumatoid arthritis who initiated their reviews through direct access were clinically and psychologically at least as well as patients having traditional reviews initiated by a physician. They requested fewer appointments, found direct access more acceptable, and had more than a third fewer medical appointments. This radical responsive management could be tested in other chronic diseases.

6) Hewlett, S., K. Mitchell, et al. (2000). "Patient-initiated hospital follow-up for rheumatoid arthritis." Rheumatology (Oxford) **39**(9): 990-7.
OBJECTIVES: To evaluate the clinical efficacy, cost and acceptability of a shared care system of patient- or general practitioner (GP)-initiated hospital review in rheumatoid arthritis (RA). METHODS: A 2-yr randomized controlled trial of routine rheumatologist-initiated review was compared with a shared care system. Shared care patients had no routine follow-up but patients or GPs initiated access to rapid review by the multidisciplinary team via a nurse-run

helpline. Control patients had a rheumatologist-initiated medical review at intervals of 3-6 months. Clinical and psychological status, resource use, and patient and GP satisfaction and confidence were assessed. Three-monthly clinical data were assessed (blind) for safety monitoring, with failure set at a 20% increase in pain, disability or disease activity. RESULTS: Two hundred and nine established RA patients participated, of whom 182 were evaluable. Safety-net failures were not different between groups. Shared care patients had less pain (24 months, 3.9 cm on a 10-cm visual analogue scale vs 4.8 cm for controls; P: < 0.05), a smaller increase in pain over 2 yr (+ 0.4 cm vs +1.6 cm for controls; P: < 0.01), greater self-efficacy (6, 15, 18, 21 months, P: < 0.05), used 33.5% less resources (208 ponds sterling per patient per year vs 313 pound sterling for controls; P: < 0.001) and were more confident in the system (6, 9, 12, 18, 21, 24 months, P: < 0.01 to P: < 0.001). CONCLUSIONS: A patient-initiated system for hospital review over 2 yr offers some clinical benefit compared with the traditional system, using fewer resources and attracting greater patient confidence. Longer-term assessment of the system would be appropriate.

7) Hungin, A. P., P. R. Thomas, et al. (1994). "What happens to patients following open access gastroscopy? An outcome study from general practice." British Journal of General Practice **44**(388): 519-21.
BACKGROUND. Open access gastroscopy allows general practitioners to request a gastroscopy without prior referral to a specialist. The effect of open access gastroscopy upon patient management is poorly explored. Most studies have been hospital based and have focused on diagnostic yields and on means of tightening requests to reduce inefficient use. A user evaluation can only be made by measuring outcomes in primary care. AIM. A study was undertaken to determine the impact of open access gastroscopy in general practice and in particular, the value of a normal result. METHOD. All general practices in South Tees District Health Authority were asked to participate. Any of their patients who had had open access gastroscopy in the year prior to July 1990 were identified from the hospital computer and their general practitioner notes examined. Patient management during the year prior to the open access gastroscopy was compared with the year after. The main outcome measures were: detection rate and grade of lesion, change in graded score of prescribed drugs, consultation rate for dyspepsia and non-dyspepsia problems, and further hospital referral and investigations. Outcomes among those with normal and abnormal gastroscopy results were compared. RESULTS. The study sample comprised 715 patients, 36% of whom had a normal gastroscopy result, 34% a major abnormality and 26% a minor abnormality (4% of patients had miscellaneous diagnoses). It was found that 39% of all patients, and 60% of those with normal findings on open access gastroscopy had their drug treatment stopped or reduced in grade after the investigation. Of those with a major endoscopic abnormality 58% increased their treatment score. Consultations for dyspepsia in the year before and after gastroscopy fell by 57% overall among those with a normal gastroscopy result, by 37% among those with a minor finding and by 33% in those with a major finding. There was a 21% fall in consultations for all reasons among those with a

normal gastroscopy result but those with a minor abnormality had a 23% increase in non-dyspepsia consultations. Of all patients 19% were referred to hospital subsequently. CONCLUSION. Open access gastroscopy has a major effect upon patient management in general practice, and a normal endoscopy result has an important an impact as an abnormal one. Open access gastroscopy is associated with a rationalization of drug therapy, reduced consultations and a low hospital referral rate.

8) Johnston, S. D., J. Kirby, et al. (1999). "A comparison of open access endoscopy and hospital-referred endoscopy in a district general hospital." Ulster Med J **68**(2): 73-8.
Open access endoscopy (OAE) is widely used in many hospitals. The aim of this study was to compare the upper gastrointestinal endoscopies referred to as "OGDs" performed under the OAE service and those referred from hospital outpatient clinics (HR) during the initial year in which an OAE service was provided in a district general hospital. A retrospective review of medical records from all patients undergoing OGD during the first year of OAE to identify the waiting time for OGD, the extent of pre-treatment at the time of OGD, the endoscopic findings and the number of endoscopies in which oesophageal or gastric neoplasia was detected. Follow-up endoscopies (n = 41) were excluded. Of 739 OGDs included, 384 (177 male; mean age 48.0 yrs.) were performed under the OAE service, 346 (149 male; mean age 50.7 yrs.) were referred from outpatient clinics and 9 could not be accurately classified. The waiting time was significantly lower in the OAE group compared to the HR group (24.5 v. 29.8 days, $p<0.001$). Pre-treatment at the time of OGD was significantly more frequent in the OAE group compared to the HR group (295 v. 186, $p<0.001$). Frequencies of the main endoscopic diagnoses did not differ significantly between the two groups. The OAE service provided faster access to OGD than the HR group and the endoscopic findings were similar in the two groups.

9) Kirwan, J. R., K. Mitchell, et al. (2003). "Clinical and psychological outcome from a randomized controlled trial of patient-initiated direct-access hospital follow-up for rheumatoid arthritis extended to 4 years." Rheumatology (Oxford) **42**(3): 422-6.
BACKGROUND: Patients with rheumatoid arthritis (RA) are traditionally seen regularly as out-patients, irrespective of whether it is appropriate or timely to see them. A randomized controlled trial has shown that over 2 yr, seeing patients only when they or their general practitioner (GP) request a review saves time and resources and is more convenient. This study aimed to assess clinical and psychological outcomes when the trial was extended to 4 yr. METHOD: A total of 209 patients were randomized into either 'routine review' (control) or 'no routine follow-up' but access to rapid review on request (direct access). Clinical and psychological status and patient satisfaction and confidence were reviewed after 24 and 48 months. RESULTS: Mean age at entry was 56 yr and mean disease duration 11 yr, and 134 patients remained in the study after 48 months. There were no differences between the groups, nor between those who completed the

study and those who did not. There were no major differences in clinical or psychological status between the groups at 24 or 48 months. However, self-efficacy for function was stronger at 48 months for direct access patients (mean 64.0 vs 52.0, P=0.005), as was self-efficacy for other symptoms (mean 67.8 vs 59.3, P=0.009). Satisfaction at 48 months was increased in direct access compared with control (mean 8.7 vs 7.6, P=0.01) as was confidence in the system (8.9 vs 7.6, P<0.01). CONCLUSION: It is effective for patients with rheumatoid arthritis to have no regular follow-up, provided they have access to rapid review when they or their GP request it. Patients using a self-referral system of care had higher self-efficacy and greater satisfaction and confidence than those using the traditional system.

10) Pace A. V., Dowson C. M. , et al. (2006). "Self-referral of symptoms (SOS) follow-up system of appointments for patients with uncertain diagnoses in rheumatology out-patients " Rheumatology **45**(2): 201-203.
Objective. Clinical features in rheumatological conditions often fluctuate with time and this may cause difficulty when evaluating patients whose symptoms or signs do not coincide with their initial rheumatology visit. The aim of this study was to evaluate the outcome of a follow-up system whereby patients with uncertain rheumatological diagnoses at their initial assessment are given easy and rapid access to a rheumatology review. Method. We studied the outcome of SOS (self-referral of symptoms) appointments offered to patients over a 44-month period in one consultant's clinic at the Staffordshire Rheumatology Centre. The reattendance rates and diagnoses at the initial and subsequent visits were evaluated over a mean period of 26.3 months (range 7–64 months). Results. Thirty-seven patients (23 males, 14 females) were offered SOS appointments during the period studied. At the initial assessment, a provisional diagnosis was recorded for 29 patients (78.4%), whereas the diagnosis was unclear for the other eight patients. At the end of the study period, 10 patients (27%) had requested specialist review via the SOS system after a mean period of 6.8 months (1–19 months). The diagnosis remained unchanged in 8 of the 10 reattenders, whereas the diagnosis was revised in two patients. None of these patients, however, developed an inflammatory arthritis. Conclusion. We suggest that an SOS system of appointments may be a feasible and practical method to follow up patients who have uncertain rheumatological diagnoses at their initial visit. This follow-up system may not easily fit into the current out-patient reforms being implemented in the National Health Service, yet this form of specialist follow-up seems clinically essential for some forms of disease management. The requirements necessary to operate such a system as well as the envisaged pros and cons for the patient and for the rheumatologist are discussed.

11) Boelke, C., B. Boushon, et al. "Achieving open access: the road to improved service & satisfaction." Medical Group Management Journal **47**(5): 58-62.
As the health care landscape continues to evolve, providers feel increasing pressure to provide not only quality care, but quality service. One area receiving particular attention is access to care. This article discusses the concept of open

access, as defined by the Institute for Healthcare Improvement's (IHI) Access collaborative, the work of Mark Murray, M.D., M.P.A. and Catherine Tantau, B.S.N., M.P.A., and Dean Medical Center's experience in implementing open access. We describe how to achieve open access and the benefits it brings. (Note: throughout this article we use the term provider, rather than physician, because the concepts are designed for physicians and other clinical professionals).

12) Kilo, C. M., P. Triffletti, et al. (2000). "Improving access to clinical offices." Journal of Medical Practice Management **16**(3): 126-32.
Optimal access to office care requires a detailed understanding of a practice's capacity to provide care and demand for services. Once capacity and demand are known, they can be effectively managed to provide care today for those needs that arise today. Such a system of "open access" benefits clinicians and patients alike. This article describes specific steps a practice can take to achieve open access.

13) Levinson, W., A. Kao, et al. (2005). "Not all patients want to participate in decision making. A national study of public preferences." Journal of General Internal Medicine **20**(6): 531-5.
BACKGROUND: The Institute of Medicine calls for physicians to engage patients in making clinical decisions, but not every patient may want the same level of participation. OBJECTIVES: 1) To assess public preferences for participation in decision making in a representative sample of the U.S. population. 2) To understand how demographic variables and health status influence people's preferences for participation in decision making. DESIGN AND PARTICIPANTS: A population-based survey of a fully representative sample of English-speaking adults was conducted in concert with the 2002 General Social Survey (N= 2,765). Respondents expressed preferences ranging from patient-directed to physician-directed styles on each of 3 aspects of decision making (seeking information, discussing options, making the final decision). Logistic regression was used to assess the relationships of demographic variables and health status to preferences. MAIN RESULTS: Nearly all respondents (96%) preferred to be offered choices and to be asked their opinions. In contrast, half of the respondents (52%) preferred to leave final decisions to their physicians and 44% preferred to rely on physicians for medical knowledge rather than seeking out information themselves. Women, more educated, and healthier people were more likely to prefer an active role in decision making. African-American and Hispanic respondents were more likely to prefer that physicians make the decisions. Preferences for an active role increased with age up to 45 years, but then declined. CONCLUSION: This population-based study demonstrates that people vary substantially in their preferences for participation in decision making. Physicians and health care organizations should not assume that patients wish to participate in clinical decision making, but must assess individual patient preferences and tailor care accordingly.

14) Mehrotra, A., L. Keehl-Markowitz, et al. (2008). "Implementing open-access scheduling of visits in primary care practices: a cautionary tale." Ann Intern Med **148**(12): 915-22.
BACKGROUND: Open-access scheduling (also known as advanced access or same-day access) is a popular tool for improving patient access to primary care appointments. OBJECTIVE: To assess the effect of open-access scheduling and describe the barriers to implementing the open-access scheduling model in primary care. DESIGN: Case series. SETTING: Boston, Massachusetts, metropolitan area. PARTICIPANTS: 6 primary care practices studied from October 2003 through June 2006. INTERVENTION: Implementation of open-access scheduling. MEASUREMENTS: Time to third available appointments, no-show rates, and patient and staff satisfaction with appointment availability. RESULTS: 5 of 6 practices were able to implement open-access scheduling. Within 4 months of implementation, these 5 practices substantially reduced their mean wait for third available appointments from 21 to 8 days for 15-minute visits and from 39 to 14 days for 30-minute visits. However, none of the 5 practices attained the goal of same-day access, and waits for third available appointments increased during 2 years of follow-up. No consistent changes in patient or staff satisfaction or patient no-show rates were found. Barriers to implementation included decreases in appointment supply from provider leaves of absence and departures and increases in appointment demand when practices reopened to new patients after initial implementation of open-access scheduling. LIMITATIONS: The study lacked control practices. The small number of practices and providers precluded formal statistical comparisons. CONCLUSION: In 5 of 6 primary care practices, implementation of open-access scheduling improved appointment access in some practices. However, none was able to achieve same-day access and patient and staff satisfaction and patient no-show rates were unchanged. Broader evaluation of open-access scheduling in primary care is needed.

15) Murray, M. and C. Tantau (1999). "Redefining open access to primary care." Managed Care Quarterly **7**(3): 45-55.
Over the last decade the term access has been used to describe the ease with which insured populations receive care. This has become a significant market issue and continues to be an important clinical issue. This article suggests that relying on clinical definitions of good access is no longer useful. The authors recommend a definition based on the patient's perspective: "The ability to seek and receive care from the provider of choice at the time the patient chooses." The authors describe a model for analyzing access systems and identify three major types. The strengths and weaknesses of each are described and the most successful access system is described in detail. This Second Generation Open Access system offers an appointment today for any problem, exceeds all regulatory requirements for access, matches patients with their PCP at unprecedented rates, reduces overall utilization, and improves patient, staff, and physician satisfaction.

16) Pascoe, S. W., R. D. Neal, et al. (2004). "Open-access versus bookable appointment systems: survey of patients attending appointments with general practitioners." British Journal of General Practice **54**(502): 367-9.
Access to consultations with general practitioners (GPs) is an important health policy issue. One method of providing 24-hour access is through the provision of open-access surgeries. The study aimed to compare patients' perceptions of 'bookable' and 'non-bookable' (open-access) appointments. A cross-sectional survey design was used and recruited 834 patients in a general practice. There were statistically significant differences between the bookable and the non-bookable appointments for the questions on 'choice of doctor', 'whether able to see the doctor in the time they needed to', and 'convenience of the appointment'. More patients with bookable appointments saw their doctor of choice. One-fifth of patients, equally distributed between the two groups, did not feel that they were seen within the time they needed to be. Almost three-fifths of patients, equally distributed between the two groups, reported that it was either 'easy' or 'very easy' to make the appointment. Greater convenience was reported by those with bookable appointments. These findings support the hypothesis that within a single practice, there is scope for a combined appointment system in which patients can self-select, with equal satisfaction, the type of appointment that they prefer, dependent upon their own preferences or needs at the time.

17) Pinto, M. B., D. Parente, et al. (2002). "Selling open access health care delivery to patients and administrators: what's the hook?" Health Marketing Quarterly **19**(3): 57-69.
A new concept in health care delivery involves the use of Open Access Scheduling for patients. In an attempt to manage spiraling medical costs and patient care demands many medical practices and managed care organizations are looking for alternative delivery models for health care. Open Access Scheduling has been garnering many advocates and converts from past traditional medical service delivery models. Unfortunately, due to its limited penetration into the medical community, little of Open Access' essential characteristics are generally understood. This paper looks at Open Access from the perspectives of: patients, medical administrators, office staff and providers. We discuss the tenets of Open Access, the benefits from its use, its challenges, and the steps necessary to initiate this type of service delivery.

18) Sanmani, L., E. Foley, et al. (2008). "Patient-initiated delay at a genitourinary medicine clinic: are there public health consequences?" Sexually Transmitted Infections **84**(7): 560-2.
OBJECTIVES: To assess the public health consequence of patients electing not to be seen within 48 hours in a genitourinary medicine (GUM) clinic. METHODS: A 3-month retrospective case notes review was carried out for 310 new and re-book patients who chose to wait for more than 48 hours to be seen. RESULTS: Altogether, 10% (310/3110) of patients opted to be seen beyond 48 h. Their median wait was 6 days including weekends and 4 days excluding weekends. Demographic details did not vary except for the male to female ratio of 1:1.7 (1:1

in patients seen within 48 h). We found that no symptomatic patients or asymptomatic contacts of those with known sexually transmitted infections (STIs) reported sex with a new partner after booking their appointment. No patient reported sex with a recently treated partner who consequently required re-treatment and none suffered a complication of a STI. In addition, there were no cases of new HIV infection in this group and the rates of STIs were similar compared with patients seen within 48 hours of contacting the unit. CONCLUSIONS: Despite 10% of patients choosing to delay attendance beyond 48 h, no adverse public health outcomes were demonstrated.

19) D Symmons, K Tricker, C Roberts, L Davies, P Dawes and DL Scott. The British Rheumatoid Outcome Study Group (BROSG) randomised controlled trial to compare the effectiveness and cost-effectiveness of aggressive versus symptomatic therapy in established rheumatoid arthritis. *Health Technol Assess* 2005;**9**(34):1–94.

Objectives: To examine the effectiveness and cost-effectiveness of symptomatic versus aggressive treatment in patients with established, stable rheumatoid arthritis (RA). **Design:** A randomised observer-blinded controlled trial and economic evaluation with an initial assessment at randomisation and follow-ups at 12, 24 and 36 months. **Setting:** Five rheumatology centres in England. The 'symptomatic care' patients were managed predominantly in primary care with regular visits by a rheumatology specialist nurse. The 'aggressive care' patients were managed predominantly in the hospital setting. **Participants:** Patients with RA for more than 5 years were screened in rheumatology clinics. **Interventions:** The symptomatic care patients were seen at home every 4 months by a rheumatology specialist nurse and annually by the rheumatologist. The aim of treatment was symptom control. The aggressive care patients were seen at least every 4 months in hospital. Their treatment was altered (following predefined algorithms) with the aim of suppressing both clinical and laboratory evidence of joint inflammation. **Main outcome measures:** The main outcome measure was the Health Assessment Questionnaire (HAQ). Others included the patient and physician global assessment, pain, tender and swollen joint counts, the erythrocyte sedimentation rate and the OSRA (Overall Status in Rheumatoid Arthritis) score. X-rays of the hands and feet were performed at the beginning and end of the study. The EQ-5D was used in the health economic evaluation. Comprehensive costs were also estimated and were combined with measures of outcome to examine between-group differences. **Results:** A total of 466 patients were recruited; 399 patients completed the 3 years of follow-up. There was a significant deterioration in physical function (HAQ) in both arms. There was no significant difference between the groups for any of the clinical outcome measures except the physician global assessment [adjusted mean difference 3.76 (95% CI 0.03 to 7.52)] and the OSRA disease activity component [adjusted mean difference 0.41 (95% CI 0.01 to 0.71)], both in favour of the aggressive arm. During the trial, second-line drug treatment was changed in 77.1% of the aggressive arm and 59.0% of the symptomatic arm. There were instances when

the rheumatologist should have changed treatment but did not do so, usually because of mild disease activity. The symptomatic arm was associated with higher costs and higher quality-adjusted life-years (QALYs). There was a net cost of £1517 per QALY gained for the symptomatic arm. Overall, the primary economic analysis and sensitivity analyses of the cost and QALY data indicate that symptomatic treatment is likely to be more cost-effective than aggressive treatment in 58–90% of cases. **Conclusions:** This trial showed no benefit of aggressive treatment in patients with stable established RA. However, it was difficult to persuade the rheumatologist and/or the patient to change treatment if the evidence of disease activity was minimal. Patients in the symptomatic arm were able to initiate changes of therapy when their symptoms deteriorated, without frequent hospital assessment. Approximately one-third of current clinic attenders with stable RA could be managed in a shared care setting with annual review by a rheumatologist and regular contact with a rheumatologist nurse. Further research is needed into disease progression and the use of biological agents, minimum disease activity level below which disease progression does not occur, cost-effectiveness through shared care modelling, the development of a robust and fail-safe system of primary-care based disease-modifying anti-rheumatic drug (DMARD) monitoring, and predicting response to DMARDs.