

Original Research Article

An audit to analyze the three-week-wait pathway at department of otolaryngology, head and neck surgery, Sligo university hospital

Tanvir Hussain*, Aisling Moriarty, Linda Tighe, Nash Patil

Department of Otolaryngology, Head and Neck Surgery, Sligo University Hospital, Irelnd

Received: 07 January 2023

Revised: 12 February 2023

Accepted: 13 February 2023

*Correspondence:

Dr. Tanvir Hussain,

E-mail: tanvirsatti2000@gmail.com

Copyright: © the author(s), publisher and licensee Medip Academy. This is an open-access article distributed under the terms of the Creative Commons Attribution Non-Commercial License, which permits unrestricted non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

ABSTRACT

Background: Otolaryngology, head and neck surgery is an area of medicine concerned with diseases of the ear, nose, throat, head and neck regions. The Three-week wait pathway was introduced in Ireland as a way to improve access to specialist care for patients with symptoms suggestive of malignancy. The pathway allows patients to be seen by a specialist within three weeks of referral from their general practitioner. This study is aimed to study the three-week wait-pathway at the department of otolaryngology head and neck surgery, its functioning and how it can be applied in the department to reduce delays.

Methods: The quantitative and qualitative research was conducted during one year from January 2021 to December 2021.

Results: The results from the audit showed an average of 22 days on referral and an average of 70 days between the times a patient enters the facility and gets out after medical decision making is done. According to the audit, the three-week wait-pathway at department of otolaryngology Head and Neck surgery Sligo university hospital is effective. There are no significant delays in referrals or appointments, and patients are generally happy with the care they receive. The audit found good communication practices within the department, as measured by patient satisfaction scores.

Conclusions: This audit has looked at a variety of aspects of the pathway, including its effectiveness in diagnosing and treating patients, its impact on patient satisfaction, and its cost-effectiveness. The evidence suggests that the three-week wait pathway is an effective way to improve patient care and outcomes. Some quality improvement strategies would be necessary to optimize patient flow and clinical efficiency.

Keywords: Audit, Analysis, Pathway, Ear, Nose, Throat, Treating patients

INTRODUCTION

One of the key services offered by the HSE is the three-week wait pathway, which allows patients with certain symptoms to be seen by a specialist within three weeks of referral.¹ These patients are seen by a specialist within two weeks of their referral. The Three-Week Wait Pathway is a national initiative in the United Kingdom that was introduced in 2000.² It is designed to improve cancer outcomes by ensuring that patients are seen by a specialist within a timely manner.³ There is a large body of evidence pertaining to the clinical benefits and cost effectiveness of

the three-week wait pathway. However, there have been concerns about the efficiency of the pathway, with some patients experiencing delays in getting an appointment with a specialist.⁴ There is a wealth of research on the three week wait pathway specifically in regard to ENT. This research has looked at a variety of aspects of the pathway, including its effectiveness in diagnosing and treating patients, its impact on patient satisfaction, and cost-effectiveness.⁵ The evidence suggests that the three-week wait pathway is an effective and safe way to improve patient care and outcomes.⁶ However, there is still room for improvement, and further research is needed to

optimize the pathway and make it even more effective. The health service executive Ireland provides free healthcare to all residents through a system of hospitals, clinics and community-based services. The three-week wait pathway was established to identify and fast track patients with a suspected new malignancy to access diagnostic tests and treatment more readily. The pathway is designed to ensure that patients are seen by the right healthcare professionals, to receive the tests and treatment required as quickly as possible.⁷ The purpose of this audit is to analyze the three-week wait pathway of the ENT department in Sligo university hospital. It will specifically focus on the following research questions; What are the main reasons for referral to the three-week wait pathway?, What are the main delays in the three weeks wait pathway?, How does the three-week wait pathway compare to similar services in other countries? And What are the possible solutions to improve the efficiency of the three-week wait pathway? The UK National Health Service (NHS) offers a similar service to the two-week wait pathway, with some variations. For example, general practitioners in the NHS can refer patients directly to specialist clinics, rather than to hospitals.⁸ In addition, the NHS offers a range of other services that can help patients during the two-week wait, such as psychological support and information about benefits and entitlements.⁹

There are several reasons why a referral to the three-week wait pathway may be made, but the most common reason is for further investigation of possible cancer symptoms, such as prolonged hoarseness, or incidental finding of new neck mass.¹⁰ The main delays in the three-week wait pathway are within the referral and diagnostic process. This research paper will utilize a variety of data sources, including patient surveys, clinical data and interviews with key stakeholders.¹¹ The paper will present a detailed analysis of the three-week wait pathway and make recommendations for improvement. The research will also include an analysis of the current pathway and how it affects patients. The Three-Week Wait Pathway is a referral pathway for patients who have been diagnosed with a possible cancerous condition.

METHODS

The research was conducted using both quantitative and qualitative methods. Quantitative methods were used to collect data on the number of patients who were seen within the three-week wait timeframe and how this affects their outcomes. Qualitative methods were used to collect data on the experiences of patients and staff within the pathway, that include interviews and focus groups. The research was conducted over a period of one year from January 2021 to December 2021, so that the effects of the three-week wait pathway can be properly assessed. The findings of the research will be used to make recommendations on how the three-week wait pathway could be improved, and will be presented as part of intradepartmental meetings. The following sequence of events was followed in an audit to analyze the three -week

wait-pathway at department of otolaryngology head and neck surgery Sligo University hospital (ENT): audit team interviews ENT clinicians to identify issues with the three-week wait pathway, audit team reviews medical records of patients who have been seen within the three-week wait pathway to identify any delays in care, audit team presents findings to ENT leadership and makes recommendations for improvement and ENT leadership implements changes to the three-week wait pathway based on the audit findings.

There are several methods that were used in carrying out an audit of the three -week wait pathway at department of otolaryngology head and neck surgery. One approach was to review the medical records of all patients who have been seen within the department over a year from January 2021 to December 2021. This would allow for a review of the care that was provided to each patient and whether or not the three-week wait pathway was followed. Another approach would be to interview a sample of patients who have been seen within the department during the three-week period. This would provide information on the patient experience and whether or not the three -week wait pathway was followed. Several methods were utilized in the audit process to assess whether the three-week wait time guidelines were followed, as well as to assess patient satisfaction. This consisted of medical record review and one on one interviews with a sample population. We also compiled data from the regional head and neck cancer MDT. The population sample used was new cancer diagnoses made over a 12-month period from 1st of January 2021 to 31 December 2021.

Referrals were primarily from general practitioners in Donegal, Mayo, Leitrim and Sligo. New patient referrals were triaged on a weekly basis by an ENT consultant. The usual clinic protocol was followed patients were clinically assessed with a history, examination and adjunctive tests such as audiology or flexible nasendoscopy. Patients were then worked up with imaging as appropriate and tissue sampling in the form of core biopsy or fine needle aspiration. Once a diagnosis of new malignancy was made patients were referred to the regional head and neck MDT in Galway university hospital, where definitive management was decided upon. Interval timing was recorded for each patient time from GP referral to first clinic date, to tissue sampling time, histology result and final MDT discussion.

RESULTS

When the rounds of the data collection were completed, the patients were referred to this center under the 3-week-wait (3 ww) pathway. Some patients did not attend their appointments and therefore were erased from the data to be analyzed. Therefore, 45 patients were seen in the head and neck department for surgery. All of these were due to patient choice except for one case, which was the sole case due to departmental capacity issues.

Table 1: The summary of wait times for different activities.

Patient number	Number days to referral	Days from procedure to histology	Days from date seen to medical decision date
1	17	16	36
2	14	13	44
3	105	12	42
4	31	7	37
5	43	6	36
6	2	0	25
7	36	7	411
8	23	0	30
9	21	13	36
10	21	22	164
11	32	5	35
12	43	0	33
13	17	0	79
14	6	12	93
15	16	27	40
16	5	23	144
17	1	5	43
18	20	0	39
19	35	49	29
20	21	10	40
21	47	3	15
22	36	16	19
23	22	85	115
24	36	20	50
25	1	16	33
26	33	8	24
27	11	4	45
28	41	9	39
29	18	0	30
30	4	16	66
31	44	12	75
32	6	9	24
33	20	65	45
34	0	14	8
35	5	15	45
36	37	18	108
37	0	1	247
38	11	34	18
39	10	0	30
40	22	12	91
41	12	27	57
42	15	85	105
43	20	10	45
44	15	7	339
45	28	0	31

This patient was seen in 23 days. The average time to being seen for all of the patients seen was 8.5 days (standard deviation of 4.3). The f of the results depicting wait times is shown in (Table 1). The data shows the various data recorded from the activity of the audit

analysis. A total of 45 patients were analyzed for the year. The referrals from primary care physicians were heterogenous in nature. Histology recorded varied from SCC, leukoplakia, atypical cells, to SCC with HPV16+.

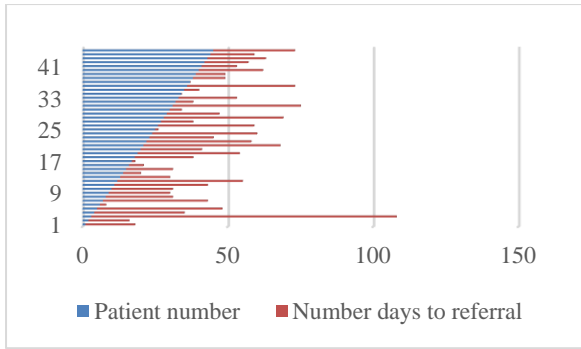


Figure 1: Number days to referral.

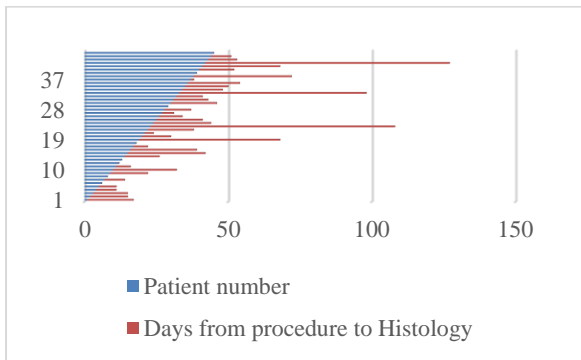


Figure 2: Days from procedure to histology.

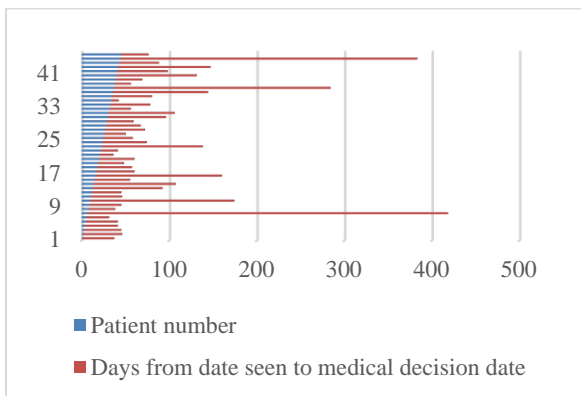


Figure 3: Days from date seen to medical decision date.

The aim of the study was to carry out an audit to analyze the three-week wait-pathway at ENT department, SUH. The results were recorded and analyzed. From the data, the average number of days to referrals was calculated and found to be about 22 with the highest number of days being 105 and the least 0 (patient did not require referral). The average number of days between the day of procedure taking to the time at which histology was 15 days and the average time between first referral to MDT decision was 70 days. From the analysis, the three-week wait pathway proved to be efficient and help reduce the time in which a patient with certain otolaryngology problems can be assessed and served. The data was represented using a bar graph as seen in the results and in (Figure 1-3). The bar

graphs charts shows the distribution of waiting durations for the recorded data in (Table 1).

DISCUSSION

There are some possible solutions to improve the efficiency of a three-week wait-pathway. This includes the introduction of a national triage pathway for patients with otolaryngology problems.¹² Another method of improving the efficiency of a three-week wait-pathway is reducing the number of patients who are referred for three-week wait appointments.¹³ By reducing the number of three-week wait appointments that are booked can also help in boosting the performance associated with the three-week wait-pathway. Another method is the introduction of a national clinical assessment service for patients with otolaryngology problems. This can also be done by increasing the number of patients who are seen within three weeks of referral as well as introducing a national urgent referral pathway for patients with the otolaryngology problems. Overall, the three -week wait pathway is an excellent public health initiative to diagnose and treat potential head and neck malignancies. The ENT department in SUH was found to perform effectively in terms of outpatient wait times, time-to-MDT discussion, and overall patient satisfaction.

Limitations

Limitations of current study were; some improvements could be made in terms of delivery of care during clinic, with some patients reporting dissatisfaction with how their condition or diagnosis was explained. These short comings will be addressed via feedback to healthcare providers, and the increased provision of relevant leaflets and brochures.

CONCLUSION

This audit has looked at a variety of aspects of the pathway, including its effectiveness in diagnosing and treating patients, its impact on patient satisfaction, and its cost-effectiveness. The evidence suggests that the three-week wait pathway is an effective way to improve patient care and outcomes. Some quality improvement strategies would be necessary to optimize patient flow and clinical efficiency.

Funding: No funding sources

Conflict of interest: None declared

Ethical approval: The study was approved by the Institutional Ethics Committee

REFERENCES

1. Hawary AM, Warburton HE, Brough RJ, Collins GN, Brown SC, O'Reilly PH, Adeyoku AA. The '2-week wait' rule for referrals for suspected urological cancers-urgent need for refinement of criteria. Ann R Coll Surg Engl. 2008;90(6):517-22.

2. Rebecca S, Steven EO, Geoff H, Victoria A, Philip M, Edward B, et al. A cohort study of patients referred on the two week wait pathway. *Cancer Epidemiol.* 2019;63:23-9.
3. Meechan D, Gildea C, Hollingworth L, Richards MA, Riley D, Rubin G. Variation in use of the 2-week referral pathway for suspected cancer: a cross-sectional analysis. *Br J Gen Pract.* 2012;62(602):e590-7.
4. Carol C, Saira H. Organizational workflow and its impact on work quality. In: patient safety and quality: an evidence-based handbook for nurses. Rockville (MD): Agency for Healthcare Research and Quality (US); 2008.
5. Prakash B. Patient satisfaction. *J Cutan Aesthet Surg.* 2010;3(3):151-5.
6. Jones R, Rubin G, Hungin P. Is the two week rule for cancer referrals working? *BMJ.* 2001;322(7302):1555-6.
7. Katiri R, Sivan N, Noone A, Farrell E, McLoughlin L, Lang B, O'Donnell B, Kieran SM. Outcomes from 7 years of a direct to audiology referral pathway. *Ir J Med Sci.* 2022;32:1-7.
8. Sarkar S, Seshadri D. Conducting record review studies in clinical practice. *J Clin Diagn Res.* 2014;8(9):JG01-4.
9. Jamshed S. Qualitative research method-interviewing and observation. *J Basic Clin Pharm.* 2014;5(4):87-8.
10. Guidance for audiologists: onward referral of adults with hearing difficulty directly referred to audiology services. Available at: <https://www.baaudiology.org/app/>. Accessed on 20 November 2022.
11. Medical Definition of Histology. Available at: <https://www.medicinenet.com/histology/definition.htm>. Accessed on 20 November 2022.
12. Greenwood-Lee J, Jewett L, Woodhouse L, Marshall DA. A categorisation of problems and solutions to improve patient referrals from primary to specialty care. *BMC Health Serv Res.* 2018;18(1):986.
13. Jahan M, Bartholomeuz T, Milburn N, Rogers V, Sibbering M, Robertson J. Transforming the 2-week wait (2WW) pathway: management of breast pain in primary care. *BMJ Open Qual.* 2022;11(1):e001634.
14. Recommended procedure: pure-tone air-conduction and bone-conduction threshold audiometry with and without masking. Available at: <https://www.thebsa.org.uk/resources/pure-tone-air-bone-conduction-threshold-audiometry-without-masking/>. Accessed on 20 November 2022.
15. Practice guidance: adult rehabilitation common principles in audiology services. Available at: <https://www.thebsa.org.uk/resources/common-principles-rehabilitation-adults-audiology-services/>. Accessed on 20 November 2022.

Cite this article as: Hussain T, Moriarty A, Tighe L, Patil N. An audit to analyze the three-week-wait pathway at department of otolaryngology, head and neck surgery, Sligo university hospital. *Int J Res Med Sci* 2023;11:789-93.