

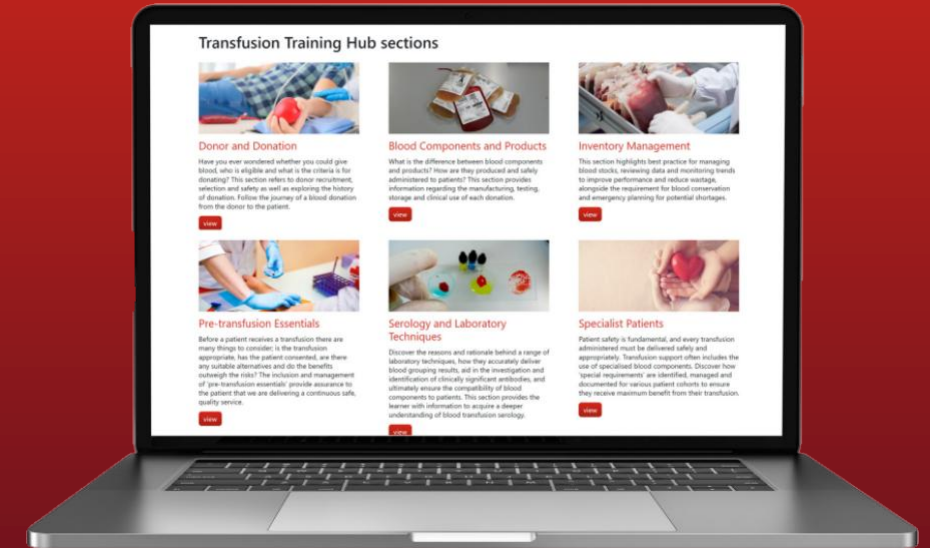


Blood and Transplant

Transfusion 2024 introduces the Transfusion Training Hub

Jill Caulfield

RCPATH & SHOT Advances in Transfusion 2024



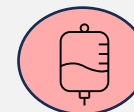


Where did the idea come from?

- In 2019, NHS Blood and Transplant and NBTC produced a 5-year plan looking at clinical and laboratory transfusion.
- Transfusion 2024 (T24) was created.
- 4 main areas/challenges identified.
- COVID delay for the projects.



Stronger Patient Blood Management Collaboration



Increased Transfusion Laboratory Safety



Enhanced Information Technology



Further Research and Innovation

Increased Transfusion Laboratory Safety, highlighted as a challenge

The goal: skilled scientific workforce with a career framework, including the development of the clinical scientist role, leading to increased recruitment and retention.

A number of deliverables were produced (clinical and scientific workforce).

A defined set of projects were then developed.


Transfusion 2024 identified challenges in the delivery of good practice and potential solutions, summarised across four themes...

Challenges

Ongoing variability in transfusion practice within and between hospitals that may impact on patient outcomes

 Stronger Patient Blood Management Collaboration

Concerns around the delivery of service from Hospital Transfusion Laboratories to support safe transfusion for patients

 Increased Transfusion Laboratory Safety

The need for IT systems development to improve safety and enable rapid, good quality data exchange across the pathway

 Enhanced Information Technology

The need for continued research, innovation and translation into practice to improve patient care and address supply chain challenges

 Further Research and Innovation

Solutions

- A system to benchmark practice and drive improvement
- An education strategy that defines the skills, knowledge and training required to reduce errors and improve appropriate use of blood components
- A PBM operating model that reflects the resources required to deliver improvement

- A skilled scientific and technical workforce with a clear career framework, including the development of the clinical scientist role, leading to increased recruitment and retention
- A pathway between hospitals and NHSBT that defines decision points for further serological investigation, reduces costs, improves hospital staff capability and enables faster patient results

- An electronic requesting system that enables reporting of RCI results direct into hospital transfusion laboratory information systems, enabling faster access to results to support decisions about patient care
- An agreed strategic approach to supporting stock management in hospitals, resulting in reduced inappropriate stock holding and wastage

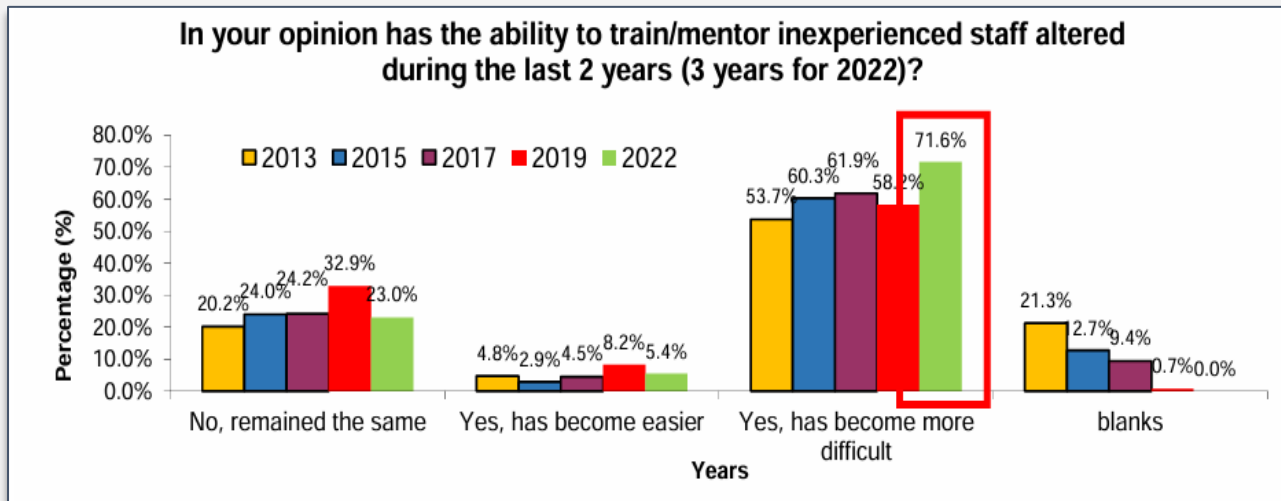
- A research programme that provides evidence on the use of data to improve patient outcomes
- A process that provides optimal donor and patient typing to meet the needs of chronically transfused patients
- An agreed pathway for faster delivery of research evidence to support practice

Where did the concerns come from?



The UK Transfusion Laboratory Collaborative (UKTLC) Survey was carried out in Dec 2022. There were 45 questions relating to various topics including staffing, IT, just culture and qualifications, knowledge and skills.

Key findings for knowledge and skills:



- 71.6% of laboratories had stated that within the last 2 years it had become more difficult to train/mentor staff.

- Most noted no specific training and development budget for transfusion and challenges with releasing staff for external educational events, both face to face and virtual.

- Respondents were keen to have more access to technology to aid self-directed learning for staff in training.

- Recommendation: UKTLC in conjunction with other professional organisations should consider providing interactive tools and resources that could be used to support self-directed learning in the workplace.*



The Timeline



Blood and Transplant

T2024 project – develop a ‘One stop shop’ of resources. A webpage to be hosted on National Blood Transfusion Committee webpage

SME was to collaborate with (SCTE) team and PBM to provide a list of resources.



Monthly progress meetings were established at the Education Working Group.



Free and accessible 24/7.



SME and web developer decided on scope and design of the webpage.

Most importantly – what was it going to be called?



A stage with red curtains and a spotlight illuminating the floor. Several roses are scattered on the floor within the spotlight.


Transfusion Training Hub



The Development – Our URS!



Blood and Transplant

1. Easy to navigate (non-interactive/ **direct link** – fewest ‘clicks’)  Very easy to navigate, search function and broken down into topics.
2. Good, useful, current resources  Resources have been reviewed and approved by SME’s and clinicians
3. Various modes of delivery to compliment different learning styles and time available to users.  Websites, documentation, podcasts, videos, online education programmes etc..
4. Signpost qualifications and courses but rate them in order of complexity  Learning material rated level 1-4
5. Inclusive! – Scientists, clinicians, practitioners, donors, patients!  Various topics applicable to all



The Transfusion Training Hub



Blood and Transplant



Home NBTC RTC Regions Education Transfusion 2024 Useful Links

Home / Transfusion Training Hub

Transfusion Training Hub

Welcome to the Transfusion Training Hub specifically created to support education and training for all healthcare professionals working within blood transfusion and for anyone wishing to increase their transfusion knowledge. The Hub provides links to existing resources all in one handy place. Resources featured have been selected to enhance an individual's learning experience based on their current level of knowledge and desired topic as well as complementing ongoing continuous professional development. Various transfusion science/medicine related courses and qualifications have been signposted as well as links to useful websites, podcasts, information and guidance.



To ensure you find the most appropriate level of training and education we have provided a guide as to the degree of complexity for all courses, qualifications and e-learning modules (see descriptions of each level from foundation to expert).

A thank you to the NBTC for supporting and hosting this webpage, created by NHSBT as part of Transfusion 2024.

Disclaimer: Content and links provided within the training hub are intended to support transfusion science/medicine education and training, however some of the courses and information may change or be updated overtime. Some links will direct the user to a main site where they must search for the intended resource title, this is to ensure the most up to date version is located. Access to some of the material may be subject to an account set up and may incur a fee. All links were accurate at the time of release but will be reviewed annually. Training and competence must always be assessed at a local level and in conjunction with local policies and procedures. Content listed within the hub is not exhaustive, and NHSBT acknowledges that other resources are available.

Levels for learning guide



Foundation Level: This level delivers introductory content for individuals wishing to build a basic underpinning knowledge of transfusion science as well as providing a baseline for further development. It may be suitable for healthcare professionals wishing to begin a career within Transfusion or a newly qualified Biomedical Scientist for example.



Intermediate Level: Next step up from foundation level, intermediate level explores each topic in more detail. This level may be suitable for healthcare professionals already working within Transfusion who require greater knowledge of a subject applicable to their role and to maintain competence. It may also be suitable for individuals wishing to progress and/or obtain further qualifications.



In-depth Level: More advanced than intermediate level, the learner will have a comprehensive understanding of transfusion science. Only one level away from the 'expert level' the content referred to will be more challenging and detailed, suitable for any healthcare professional wishing to solidify their knowledge and progress in their career.



Expert Level: Designed for very experienced healthcare professionals working within transfusion, this level delivers highly detailed and complex transfusion science content with an aim to support individuals progressing professionally within their career and for those wishing to obtain a higher level of expertise.

Located on NBTC website
Learning guide on front page



➤ Foundation



➤ Intermediate



➤ In-depth



➤ Expert

Divided into 9 topics (after much discussion)



Transfusion Training Hub Sections



Blood and Transplant



Donor and Donation



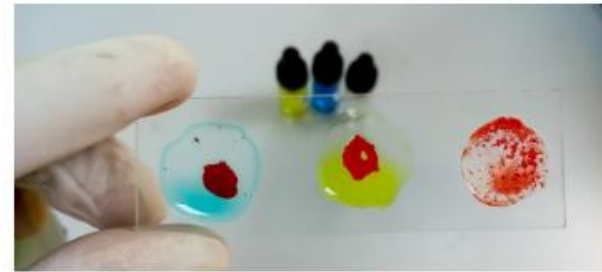
Blood Components and Products



Inventory Management



Pre-transfusion Essentials



Serology and Laboratory Techniques



Specialist Patients



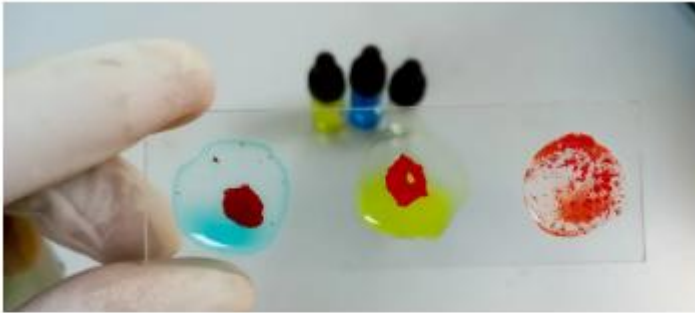
Serious Adverse Reactions and Events (Incident Management)



Governance and Regulation



Career Progression and Professional Development



Serology and Laboratory Techniques











Discover the reasons and rationale behind a range of laboratory techniques, how they accurately deliver blood grouping results, aid in the investigation and identification of clinically significant antibodies, and ultimately ensure the compatibility of blood components to patients. This section provides the learner with information to acquire a deeper understanding of blood transfusion serology.

view



Serology and Laboratory Techniques

A wide range of serological techniques are available to aid in the safe delivery of compatible components to patients. From the basics of blood grouping to complex antibody investigation the aim of this section is to equip blood transfusion staff with the knowledge to locate and match suitable components to patients whilst highlighting and following national guidance. Provision of components in various situations as well as referral to specialist laboratories is also featured.

 Course +	 Documentation +	 E-learning +
 Mobile and web application +	 Online Education +	 Podcasts +
 Qualification +	 Video +	 Webinar/Seminar +
 Website +		



Transfusion Training Hub Section examples



Blood and Transplant

Serology and Laboratory Techniques - Podcast

Podcast

Blood Bank Guy - Essentials Podcast

[Blood Bank Guy Essentials Podcast - Blood Bank Guy \(bbguy.org\)](#)

Blooducation Podcast - Appropriate use of O D Negative blood

[Appropriate use of O D neg blood – Dr Suzy Morton – Blooducation](#)

Blooducation Podcast - Basics of blood grouping

[ABO and D grouping – Dr Sara Wright – Blooducation](#)

Blooducation Podcast - Characteristics of blood group systems Part I - Antibody testing and the Rh group

[Characteristics of blood group systems part 1: antibody testing and the Rh grou...](#)

Blooducation Podcast - Investigation of the patient with a pan reactive antibody screen

[Investigation of the patient with a panreactive antibody – Ruth Evans – Blooduc...](#)

Blooducation Podcast - Special components in transfusion

[Special components in transfusion – Dr Suzy Morton – Blooducation](#)

Also in this section

Courses	+
Documentation	+
E-learning	+
Mobile and web applications	+
Online Education	+
Podcasts	+
Qualifications	+
Videos	+
Webinars/Seminars	+
Websites	+



Transfusion Training Hub Section examples



Blood and Transplant

Serology and Laboratory Techniques - Video

Video

Full blood count made easy

Patient group: Haematology/Oncology

<https://www.youtube.com/watch?v=RjDJik0CKbc>

Healthcare Science Education - Blood transfusion

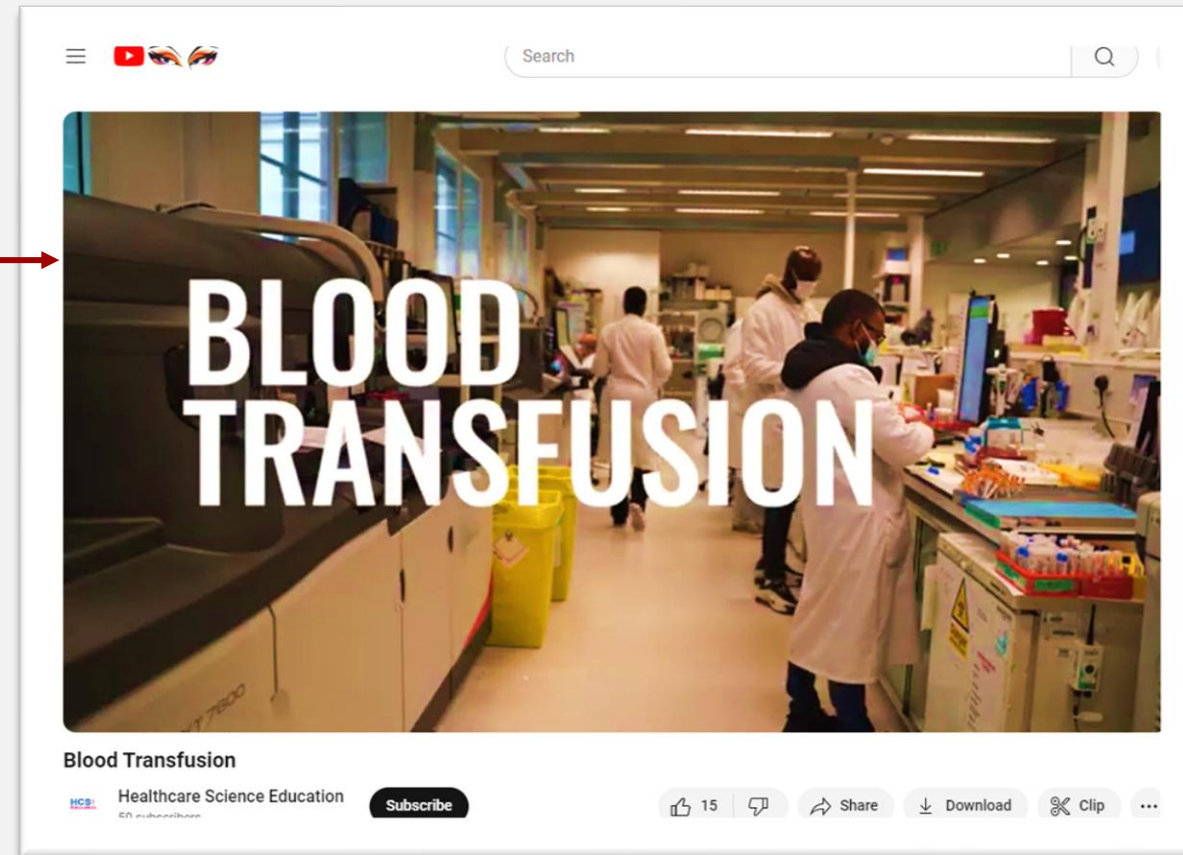
<https://www.youtube.com/watch?v=GnmAci8tgoc>

NHS Blood and Transplant - Virtual Reality video promo - Blood Transfusion training

<https://www.youtube.com/watch?v=ak95c8gRumo>

Royal College of Pathologists - The journey of a blood sample

<https://www.youtube.com/watch?v=Skm4jHH0rTI>





The Launch



Blood and Transplant

- Before 'go live' all content checked/approved – links tested
- Stakeholder involvement – BMS, TLM, TO, TP, Patient rep, UKTLC, SHOT
- Access to links/logos granted (BBTS, IBMS etc..)
- Go live discussed with NHSBT comms
- Poster and flyer designed for promotion
- Go live date decided - 8th April 2024





The Launch - Promotion



Blood and Transplant



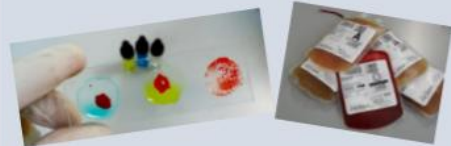
Transfusion 2024 welcomes the new **Transfusion Training Hub**

What is the Transfusion Training Hub?

As part of the **Scientific Education and Training Strategic Plan for Transfusion 2024** a webpage has been created to host various transfusion education resources, freely accessible to all. The **'Transfusion Training Hub'**, hosted on the NBTC website has been developed to support education and training for all healthcare professionals working within blood transfusion and for anyone wishing to increase their transfusion knowledge.

Sections include:

- Donors and donation
- Blood components and products
- Inventory management
- Pre-transfusion essentials
- Serology and laboratory techniques
- Specialist patient groups
- Incident management
- Governance and regulation
- Career progression and professional development



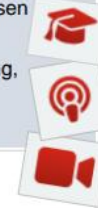
Visit: [Transfusion Training Hub | National Blood Transfusion Committee](#) or scan QR code



Discover your preferred resource

A **'one stop shop'** of various training and education resources carefully selected and displayed as a **link** within your chosen section.

Discover courses, qualifications, documentation, e-learning, podcasts, websites, videos and more!



Content includes

- NHSBT courses
- SHOT resources
- IBMS accredited undergraduate degree courses
- Postgraduate/further qualifications (eg: BBTS, MSc, HSD)
- Guidance and regulation (eg: BSH, MHRA, SaBTO, UKAS)
- Educational podcasts
- E-learning platforms
- Educational YouTube videos



Learn at a comfortable pace

Qualifications, courses and e-learning resources have been categorised into 4 levels depending on the complexity of the content.

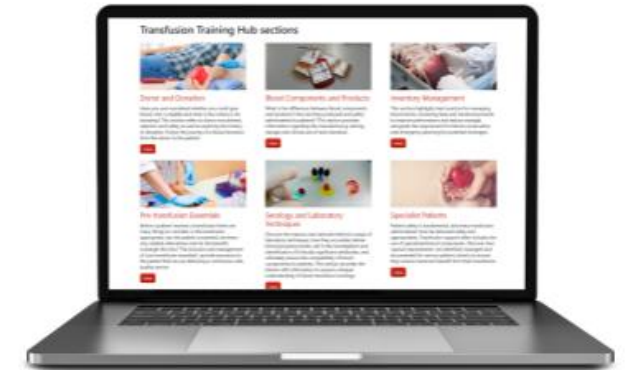
Beginning at **foundation** level then moving onto **intermediate**, followed by **in-depth** and finally **expert**, learners can learn at their own pace in their own time! Each stage is represented by a light bulb located next to the link.



Blood and Transplant

Transfusion Training Hub

The **one stop shop** for transfusion education resources

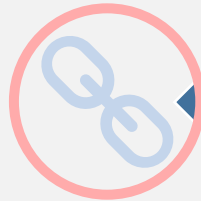


Learn at your own pace
in your own time



Discover links to valuable transfusion resources
Visit nationalbloodtransfusion.co.uk/transfusion-training-hub
or scan the QR code





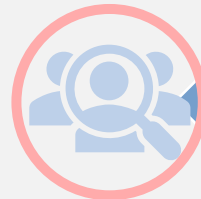
Non interactive – links only



Keeping up to date



Inbox monitoring and actions



Ownership

Did we meet the requirement?

Recommendation: UKTLC in conjunction with other professional organisations should consider providing interactive tools and resources that could be used to support self-directed learning in the workplace.



Project CS1: One stop shop for all transfusion resource already available

We listened

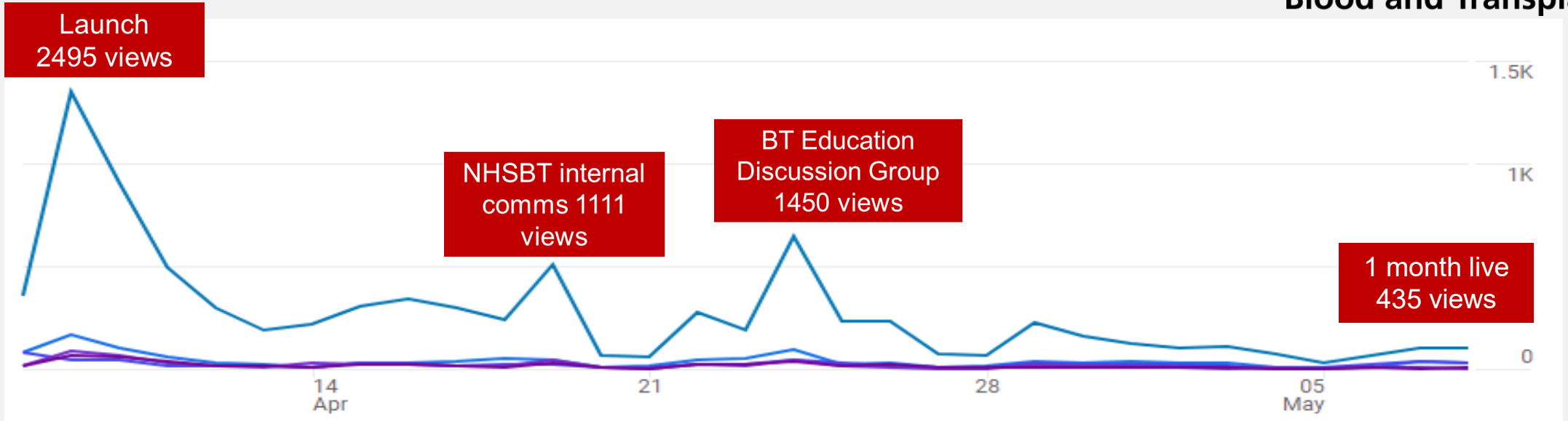
- **NHSBT** included the development of this resource in their T2024 plan (**protected time and funded**).
- Stakeholders provided vital feedback – found it to be a **useful tool**, to be included in CPD plans, training and competency matrix, useful for teaching, **self-directed learning 24/7**.
- Content will be **current, relevant and approved** for professional development - from free e-learning platforms to IBMS accredited university BSc/MSc courses.
- **Better educated workforce?**
- **Benefit to patients – increased patient safety!**



Google analytics



Blood and Transplant



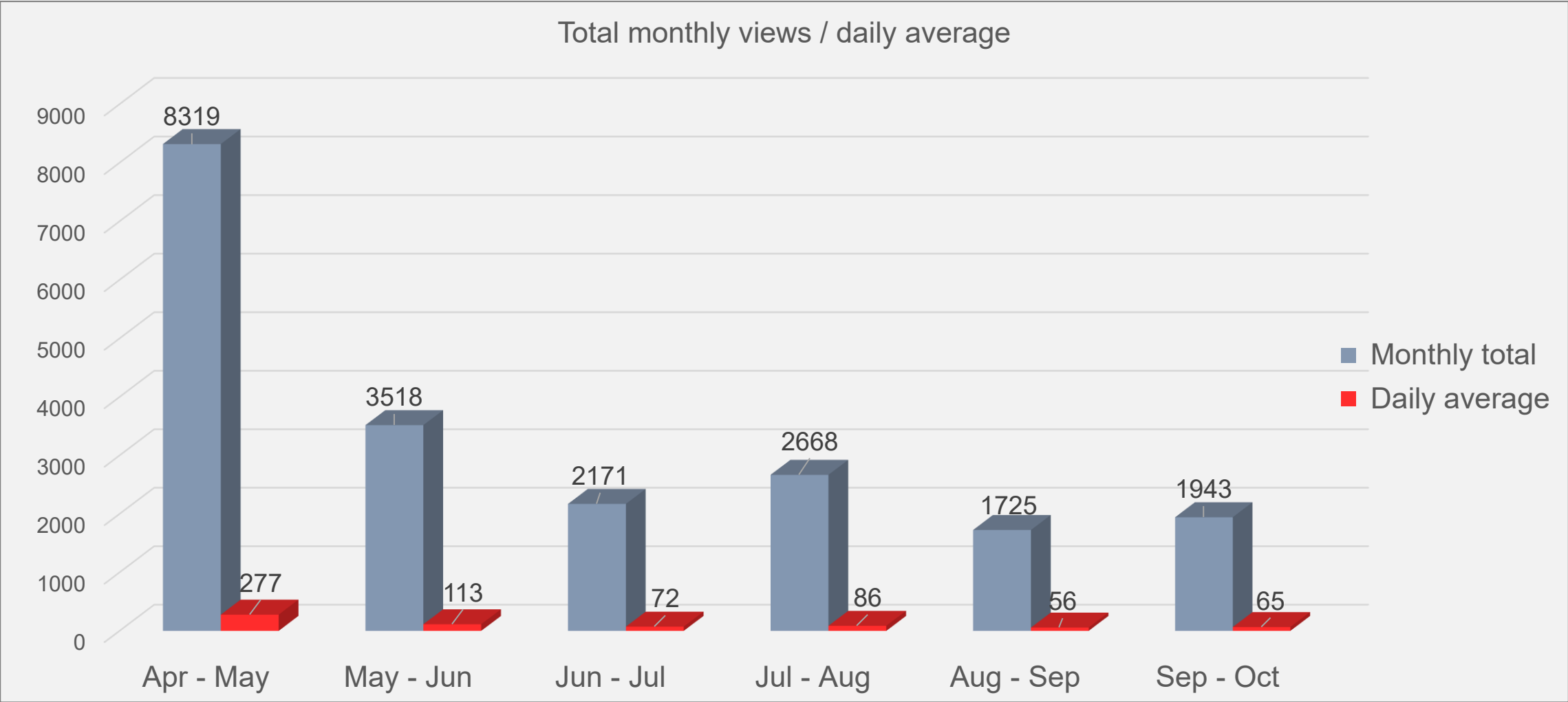
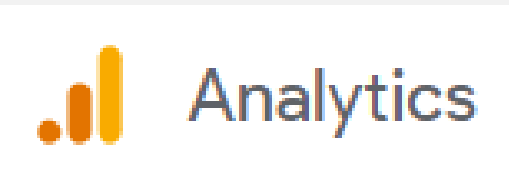
Page title and screen class	Views
	19,668 100% of total
1 Transfusion Training Hub National Blood Transfusion Committee	8,423
2 National Blood Transfusion Committee	1,158
3 Transfusion 2024 National Blood Transfusion Committee	708
4 Serology and Laboratory Techniques National Blood Transfusion Committee	537
5 Blood Components and Products National Blood Transfusion Committee	509
6 Education National Blood Transfusion Committee	508
7 Documents and Resources National Blood Transfusion Committee	502
8 Page not found (404) National Blood Transfusion Committee	412
9 Donor and Donation National Blood Transfusion Committee	385
10 Regions National Blood Transfusion Committee	340

Total NBTC views (1 month) = 19668

Top 10

- **Transfusion Training Hub = 8423**
- Serology and Lab techniques = 537
- Blood components = 509
- Donor and donation = 385
- **Total = 9854 (50%) – 328 daily views on average**

Project CS1 – Google Analytics



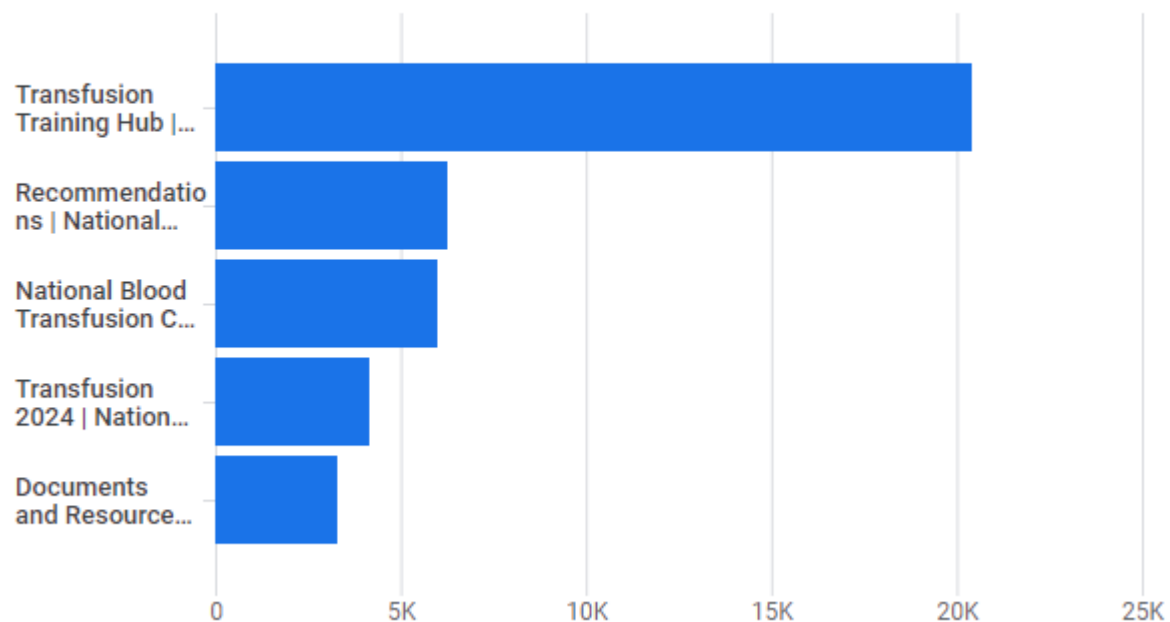
Total views for Transfusion Training Hub – 6 months since go live (8th April – 8th October 2024)



Blood and Transplant

Views by Page title and screen class

Top 5



Page title and screen class	Views
<input checked="" type="checkbox"/> Total	80,841 100% of total
<input type="checkbox"/> 1 Transfusion Training Hub National Blood Transfusion Committee	20,426
<input type="checkbox"/> 2 Recommendations National Blood Transfusion Committee	6,287
<input type="checkbox"/> 3 National Blood Transfusion Committee	6,000
<input type="checkbox"/> 4 Transfusion 2024 National Blood Transfusion Committee	4,171
<input type="checkbox"/> 5 Documents and Resources National Blood Transfusion Committee	3,314
<input type="checkbox"/> 6 Education National Blood Transfusion Committee	2,634
<input type="checkbox"/> 7 Page not found (404) National Blood Transfusion Committee	2,009
<input type="checkbox"/> 8 Blood Transfusion Education and Discussion Group (BTEDG) National Blood Transfusion Committee	1,684
<input type="checkbox"/> 9 Events National Blood Transfusion Committee	1,659
<input type="checkbox"/> 10 About the National Blood Transfusion Committee National Blood Transfusion Committee	1,394

Caring Expert Quality

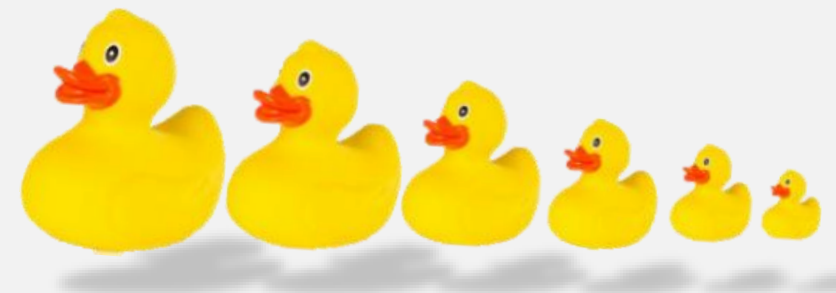


The Future



Blood and Transplant

- Webpage maintenance (links)
- Inbox monitoring
- Approval process for new content - working group
- Full annual review
- Monitoring success – Ongoing Google analytics
- Next UKTLC survey - ? improvement



Thank you
Any questions?

