

Blood Transfusion Procedure Checklist

Blood Transfusion Procedure Checklist A blood transfusion is a critical medical procedure that involves transferring blood or blood components from a donor to a recipient. Ensuring the safety and success of this procedure requires meticulous preparation, adherence to protocols, and careful monitoring. A comprehensive **blood transfusion procedure checklist** is essential for healthcare professionals to minimize risks, prevent errors, and promote patient safety. This article provides an in-depth guide to the key steps involved in the blood transfusion process, organized into clear sections for easy reference.

Pre-Transfusion Preparations

Proper preparation before initiating a blood transfusion is vital. This phase involves verifying patient identity, assessing blood compatibility, and ensuring all necessary materials are available.

Patient Identification and Verification

1. Confirm the patient's identity using two unique identifiers (e.g., name and date of birth) as per hospital protocol.
2. Verify the patient's blood type and cross-match results against the transfusion order.
3. Ensure the patient's consent has been obtained and documented.

Review Medical History and Indications

1. Assess for any history of previous transfusion reactions or allergies.
2. Check for contraindications such as severe circulatory overload, certain infections, or specific hematologic conditions.
3. Confirm the necessity of transfusion based on current clinical assessments and laboratory results.

Preparation of Equipment and Materials

1. Gather all necessary supplies, including sterile gloves, transfusion set, IV catheter, blood products, and emergency medications.
2. Inspect blood bag labels and cross-matching documentation for accuracy.
3. Prepare infusion equipment, ensuring compatibility with blood components.

Patient Assessment and Baseline Data

1. Record vital signs (heart rate, blood pressure, respiratory rate, temperature) before starting.
2. Assess the patient's overall condition and hydration status.
3. Document baseline observations in the patient's medical record.

Initiating the Blood Transfusion

This phase involves setting up the infusion system, verifying blood compatibility, and administering the transfusion safely.

Patient Preparation

1. Explain the procedure to the patient, including potential risks and what to report during transfusion.
2. Ensure the patient is comfortably positioned, typically in a semi-reclined or lying position.
3. Establish an IV line using a suitable gauge catheter, preferably 18-20 gauge for blood transfusions.

Blood Product Verification

1. Double-check the blood product label against the transfusion order and patient identification.
2. Verify compatibility, blood component type, and expiration date.
3. Ensure the blood product has been stored correctly and has not expired.

Preparation of the Blood Transfusion Set

1. Prime the transfusion set with normal saline to remove air bubbles.
2. Attach the blood bag to the transfusion set carefully, avoiding contamination.
3. Use a filter (if provided) to eliminate any clots or debris during transfusion.

Initiating the Transfusion

1. Start the infusion slowly, typically at a rate of 50 mL/hour for the first 15 minutes.
2. Monitor the patient closely during this initial period for any signs of adverse reactions.
3. Gradually increase the flow rate as tolerated, following institutional protocols.

Monitoring During Transfusion

Continuous observation during the procedure is essential to detect and manage any adverse reactions promptly.

Patient Monitoring

1. Check vital signs every 15 minutes initially, then every 30 minutes or as per protocol.
2. Observe for signs of transfusion reactions, such as fever, chills, rash, flank pain, or respiratory distress.
3. Assess the patient's overall comfort and response to the transfusion.

Maintaining Aseptic Technique

1. Ensure all connections remain sterile throughout the procedure.
2. Handle blood products and infusion equipment with gloves, avoiding contamination.
3. Dispose of used materials properly in designated biohazard containers.

Documentation During Transfusion

1. Record start time, infusion rate, and any observations or patient complaints.
2. Note vital signs at specified intervals.
3. Document any adverse events or reactions promptly.

Post-Transfusion Procedures

After completing the transfusion, proper procedures are necessary to conclude the process safely and monitor for delayed reactions.

Ending the Transfusion

1. Stop the infusion once the prescribed volume has been administered or if adverse reactions occur.
2. Disconnect the blood tubing and dispose of it appropriately.
3. Flush the IV line with normal saline to clear remaining blood components.

Patient Assessment and Observation

1. Reassess vital signs and compare them with baseline measurements.
2. Monitor for any delayed transfusion reactions, such as fever, hemolysis, or allergic responses.
3. Inspect the patient for signs of fluid overload, especially in at-risk populations.

Documentation and Reporting

1. Record the total volume transfused, start and end times, and any reactions.
2. Document patient tolerance and any interventions required.
3. Report any adverse reactions promptly to the appropriate medical team and complete incident reports if necessary.

Patient Education and Follow-Up

1. Inform the patient about signs of delayed reactions and instruct them to report any symptoms immediately.
2. Provide post-transfusion care instructions and schedule follow-up appointments if needed.
3. Advise on hydration and activity restrictions, if applicable.

Additional Tips for a Successful Blood Transfusion

To ensure optimal safety and effectiveness, healthcare professionals should adhere to best practices during blood transfusions.

Key Recommendations

1. Always perform a double-check with a second qualified healthcare professional before administering blood products.
2. Maintain clear communication with the patient throughout the procedure.
3. Be prepared to manage transfusion reactions with emergency medications and protocols.
4. Ensure staff are trained and familiar with transfusion guidelines and emergency procedures.
5. Keep emergency equipment, such as epinephrine and antihistamines, readily available during transfusions.

Conclusion

A **blood transfusion procedure checklist** is an indispensable tool that promotes safety, accuracy, and quality in transfusion practices. By systematically following the outlined steps—from pre-transfusion verification to post-transfusion monitoring—healthcare professionals can minimize risks and enhance patient outcomes. Regular training, adherence to protocols, and vigilant observation are key components of successful blood transfusion management. Implementing a comprehensive checklist not only ensures compliance with best practices but also fosters confidence in delivering this life-saving procedure effectively and safely.

Blood transfusion procedure checklist: Ensuring safety and efficacy in clinical practice

Blood transfusion is a critical therapeutic intervention that can save lives in numerous clinical scenarios, including trauma, surgeries, anemia, and hematologic disorders. Despite its routine nature, transfusion carries inherent risks such as transfusion reactions, infections, and errors stemming from misidentification or procedural lapses. To mitigate these risks and ensure optimal patient outcomes, healthcare providers rely on a comprehensive blood transfusion procedure checklist. This structured approach promotes standardization, minimizes errors, and enhances patient safety. In this article, we delve into the detailed components of an effective blood transfusion checklist, exploring each step's rationale and execution to provide a thorough understanding for clinicians, nurses, and transfusion teams.

Understanding the Importance of a Blood Transfusion Checklist

A blood transfusion checklist functions as a vital safety tool that standardizes procedures across healthcare settings. It serves multiple purposes:

- **Error Prevention:** By systematically verifying patient identity, blood compatibility, and procedural steps, the checklist minimizes the risk of mismatched transfusions, which can have catastrophic consequences.
- **Ensuring Protocol Adherence:** It ensures that all necessary steps, from pre-transfusion preparations to post-transfusion monitoring, are followed consistently.
- **Enhancing Communication:** Facilitates effective communication among multidisciplinary teams involved in the transfusion process.
- **Legal and Documentation Purposes:** Provides documented evidence that protocols were adhered to, which is crucial for medico-legal considerations.

The World Health Organization (WHO) and various national health agencies advocate for the routine use of checklists in transfusion medicine, emphasizing their role in improving patient safety.

Pre-Transfusion Preparations

Preparation is the cornerstone of a safe transfusion process. It involves patient assessment, blood product verification, and environment readiness.

1. Confirm the Indication for Transfusion

Before initiating any transfusion, clinicians must verify that the indication aligns with established guidelines. Common indications include significant anemia, acute blood loss, or specific hematologic conditions. Overtransfusion or unnecessary transfusions pose risks and should be avoided.

2. Obtain Informed Consent

Patients should be informed about the procedure, potential risks, benefits, and

alternatives. Documented informed consent is essential for ethical and legal reasons.

3. Verify Patient Identity

Accurate patient identification is fundamental. Use at least two identifiers—such as full name, date of birth, medical record number—to confirm the patient's identity against the blood transfusion request form and compatibility label.

4. Review Laboratory and Compatibility Data

- Blood Group and Rh Status: Confirm the patient's blood type and Rh factor. - Crossmatch Compatibility: Ensure the blood product has undergone proper crossmatching procedures. - Special Requirements: Note any additional testing for rare blood types or antibody screening.

5. Confirm Blood Product Details

- Product Type: Whole blood, packed red blood cells, plasma, platelets, etc. - Expiration Date: Ensure the blood is within the valid storage period. - Blood Unit Labeling: Verify matching blood group, Rh status, donor ID, and compatibility tags.

6. Check for Contraindications

Assess for conditions such as: - History of transfusion reactions - Unresolved febrile illnesses - Contraindications to blood products

Preparation of Equipment and Environment

A sterile, organized environment reduces contamination risks and procedural errors.

1. Gather Necessary Equipment

- Blood administration sets (with filters if required) - Sterile gloves and hand hygiene supplies - Saline infusion set for priming - Blood product labels and compatibility tags - Documentation forms or electronic records

2. Confirm Proper Storage and Handling

Ensure blood products have been stored at appropriate temperatures and have not expired. Inspect the blood component for discoloration, clots, or hemolysis.

3. Prepare Patient and Environment

- Confirm patient positioning (usually supine or semi-recumbent) - Ensure privacy and comfort - Prepare emergency medications (e.g., antihistamines, adrenaline) for adverse

reactions

Executing the Blood Transfusion

The actual transfusion process involves multiple verification steps and careful monitoring.

1. Final Patient Identification and Blood Product Verification

- Cross-verify patient ID, blood unit label, and compatibility tags at the bedside. - Confirm the matching of the patient's identity with the blood product details. - Double-check the expiry date and blood product integrity.

2. Prime the Blood Transfusion Set

- Use sterile saline (0.9% sodium chloride) to prime the administration set. - Avoid using dextrose or other solutions that may cause hemolysis.

3. Initiate the Transfusion

- Connect the blood product to the administration set. - Begin the infusion slowly, especially during the first 15 minutes, to monitor for adverse reactions. - Document the start time, blood unit number, and initial vital signs.

4. Monitoring During Transfusion

Continuous vigilance is vital: - Vital Signs: Record pre-transfusion vitals (temperature, pulse, blood pressure, respiratory rate). Recheck at 15-minute intervals. - Patient Observation: Watch for signs of transfusion reactions—fever, chills, rash, dyspnea, hypotension, or back pain. - Infusion Rate: Adjust as per protocol and patient tolerance, ensuring not to exceed recommended rates.

5. Completing the Transfusion

- Once the prescribed volume is infused, stop the transfusion. - Flush the line with saline to ensure complete delivery of blood components. - Disconnect the transfusion set carefully, and dispose of used materials appropriately.

Post-Transfusion Management and Documentation

Proper documentation and monitoring post-transfusion are crucial for patient safety and future reference.

1. Post-Transfusion Vital Signs and Assessment

- Record vital signs immediately after completion. - Assess for delayed reactions, which may include fever, jaundice, or hemolysis.

2. Monitor for Transfusion Reactions

Patients should be observed for at least 24 hours post-transfusion for signs of delayed reactions such as: - Alloimmunization - Iron overload - Febrile non-hemolytic reactions

3. Document the Transfusion

- Record details: blood unit number, volume infused, start and end times, patient responses, and any adverse events. - Note the name of the personnel performing the procedure.

4. Notify the Blood Bank and Report Adverse Events

Any transfusion reaction or complication must be reported to the blood bank and documented in the patient's medical record according to institutional policies.

Special Considerations and Safety Enhancements

While the core checklist covers routine procedures, certain clinical situations demand additional precautions.

1. Pediatric and Neonatal Transfusions

- Use specially prepared blood components. - Smaller infusion sets and meticulous verification are necessary.

2. Emergency Transfusions

- When time is critical, rapid crossmatching or type-specific transfusions are performed. - Use of O-negative blood in emergencies is common but still requires verification.

3. Transfusion in Patients with Autoimmune Hemolytic Anemia

- Additional laboratory testing may be required. - Close monitoring due to increased risk of hemolytic reactions.

4. Use of Electronic Verification Systems

- Incorporation of barcode scanning enhances accuracy and reduces human errors. - Electronic checklists can streamline documentation and verification processes.

Conclusion: The Pillar of Safe Transfusion Practice

The blood transfusion procedure checklist is an indispensable component of modern transfusion medicine. Its comprehensive nature ensures that every step—from pre-transfusion preparations through post-transfusion monitoring—is executed with precision and consistency. By adhering to a structured checklist, healthcare professionals significantly reduce the likelihood of errors, adverse reactions, and infections, thereby safeguarding patient health. In an era where patient safety is paramount, integrating checklists into routine clinical practice embodies a proactive approach to quality assurance. Continuous education, training, and audits are essential to maintain high standards and adapt to emerging best practices. Ultimately, meticulous attention to detail via a robust checklist not only enhances safety but also fosters confidence among clinicians and patients alike in the life-saving act of blood transfusion.

The first time many readers come across **Blood Transfusion Procedure Checklist**, it is rarely by accident. Often, it starts with a small moment of uncertainty—a question that cannot be answered quickly, a task that requires deeper understanding, or a topic that refuses to be ignored.

At first, the intention may be simple. Read a few pages, find a specific answer, then move on. But as the content unfolds, the purpose often changes. One chapter leads naturally to another, and what began as a short search becomes a longer, more thoughtful engagement.

Having **Blood Transfusion Procedure Checklist** available in PDF format makes this shift possible. There is no pressure to rush. The book waits quietly, ready to be opened whenever time allows. Readers can pause, return later, and continue without losing their place or their focus.

Reading begins to fit into everyday life. A few pages in the early morning, a bookmarked section revisited in the afternoon, or a highlighted paragraph reviewed at night. These small moments add up, shaping understanding gradually rather than all at once.

The structure of the text provides comfort. Familiar page layouts, consistent headings, and clear sections create a sense of orientation. Over time, readers remember not just the ideas, but where they found them.

Annotations become personal markers of thought. A highlighted sentence reflects agreement, while a note in the margin captures a question or insight. When readers return weeks later, they are greeted by traces of their earlier thinking, creating a quiet conversation across time.

Search tools add a practical layer to this experience. Instead of starting from the beginning again, readers can jump directly to the idea they need. This turns the book into a resource that grows in usefulness rather than fading after the first reading.

Trust also plays a role. Knowing that **Blood Transfusion Procedure Checklist** comes from a legitimate and reliable source allows readers to engage without hesitation. There is reassurance in focusing on meaning rather than questioning authenticity.

For students, this format offers stability. Exam preparation becomes less frantic when material is always accessible. Concepts can be revisited calmly, reinforcing understanding through repetition rather than pressure.

Professionals often experience a different kind of value. Sections that once seemed theoretical gain relevance when applied to real situations. The book becomes something to consult, not just something that was read.

Independent learners appreciate the freedom. There is no schedule to follow, no external expectation. Progress happens at a personal pace, guided by curiosity and need.

Over time, readers notice subtle changes. Ideas from **Blood Transfusion Procedure Checklist** begin to influence how they think, speak, or approach problems. The learning extends beyond the page into daily decisions.

Accessibility features ensure that this experience is not limited to one type of reader. Adjustable text sizes and supportive tools make engagement more comfortable for diverse needs.

Organization adds another layer of ease. The file remains stored, searchable, and ready. Even after long breaks, returning feels natural rather than overwhelming.

What stands out most is how the relationship with the book evolves. It is no longer just something that was downloaded. It becomes familiar, reliable, and quietly useful.

Each return to **Blood Transfusion Procedure Checklist** brings something slightly different. New insights appear, previous questions find answers, and understanding deepens without announcement.

In this way, reading becomes less about finishing and more about revisiting. The value lies in the continuity, in knowing that the material is always there when reflection calls for it.

This ongoing presence turns learning into a long-term companion rather than a temporary task—one that adapts, supports, and remains relevant as the reader grows.

Questions & Answers About blood transfusion procedure checklist

No	Question	Answer
1	What are the essential steps included in a blood transfusion procedure checklist?	The checklist typically includes verifying patient identity, confirming blood compatibility, obtaining informed consent, inspecting the blood product for integrity, checking expiration dates, ensuring proper equipment setup, monitoring patient vital signs, documenting all procedures, and observing for adverse reactions.
2	Why is patient identification crucial in the blood transfusion checklist?	Accurate patient identification prevents transfusion errors, ensuring the right blood product is given to the correct patient, thereby reducing the risk of transfusion reactions and other complications.
3	How should blood compatibility be verified according to the checklist?	Blood compatibility is verified by cross-matching the patient's blood type with the donor unit, checking blood labels, and ensuring that compatibility testing results are documented and match before transfusion.
4	What are the key items to check before administering blood according to the checklist?	Key items include confirming patient identity, verifying blood product details (blood type, expiration date), inspecting the blood bag for leaks or discoloration, and ensuring the infusion set is sterile and functioning properly.
5	How does the checklist help in monitoring the patient during blood transfusion?	The checklist emphasizes regular monitoring of vital signs (such as temperature, blood pressure, pulse), observing for signs of transfusion reactions, and ensuring the patient remains comfortable throughout the procedure.
6	What documentation is necessary as part of the blood transfusion procedure checklist?	Documentation should include patient details, blood product information, consent confirmation, dates and times of transfusion, vital signs before, during, and after, and any adverse reactions observed.
7	What are common errors that the blood transfusion checklist aims to prevent?	The checklist aims to prevent errors such as administering the wrong blood type, transfusing expired blood, inadequate patient identification, improper equipment use, and failure to monitor for adverse reactions.

8	When should the blood transfusion procedure checklist be reviewed and updated?	The checklist should be reviewed and updated regularly based on current guidelines, institutional policies, and after any incidents or adverse events to ensure optimal safety practices.
9	Are there specific training requirements for staff following the blood transfusion checklist?	Yes, staff should be trained on the proper procedures outlined in the checklist, including patient identification, blood compatibility testing, recognizing transfusion reactions, and documentation protocols.
10	How does the checklist contribute to patient safety during blood transfusion?	The checklist standardizes procedures, minimizes human error, ensures critical safety steps are followed, and enhances monitoring, all of which contribute to reducing adverse events and improving patient outcomes.

blood transfusion steps, transfusion safety, patient identification, blood compatibility testing, infection control, transfusion monitoring, adverse reaction protocols, pre-transfusion assessment, consent process, documentation checklist

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Blood Transfusion Procedure Checklist eBooks provide structured digital knowledge.

Core Discussion

Digital books help readers maintain productivity.

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Blood Transfusion Procedure Checklist eBooks support consistent study routines.

Conclusion

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Compatibility is a crucial factor when accessing and using Blood Transfusion Procedure Checklist in digital form. Ensuring that your device and software support the file format helps prevent reading issues, formatting errors, or loss of functionality. Fortunately, most modern devices are designed to handle common digital document formats with ease.

PDF is the most universally supported format for Blood Transfusion Procedure Checklist. Almost all computers, tablets, and smartphones can open PDF files using built-in viewers or free applications. This universal compatibility makes PDF an ideal choice for users who access content across multiple devices or operating systems. PDFs also preserve layout and formatting, ensuring a consistent reading experience regardless of screen size.

ePub formats offer greater flexibility in text layout, allowing font size, spacing, and margins to adapt to different screens. However, ePub files may require specific readers or applications, especially on desktop computers. Many mobile devices and eReaders support ePub natively, while others may need additional software. Before downloading Blood Transfusion Procedure Checklist in ePub format, it is advisable to confirm reader compatibility to avoid conversion issues.

Audiobook formats provide an alternative way to consume Blood Transfusion Procedure Checklist, particularly for users who prefer listening over reading. Audiobooks can usually be played on standard media applications available on smartphones, tablets, and computers. Ensuring that the audio format is supported by your device guarantees smooth playback and uninterrupted listening sessions.

Keeping reading applications and operating systems up to date improves compatibility. Updates often include bug fixes, performance improvements, and support for newer file standards. Regular maintenance ensures that Blood Transfusion Procedure Checklist files open correctly and that advanced features such as annotations or interactive elements function as intended.

Optimizing compatibility across devices

For users who switch between multiple devices, synchronizing reading apps and cloud accounts enhances compatibility. Progress, bookmarks, and annotations can be shared seamlessly, creating a consistent experience. Choosing widely supported formats and reliable reading software reduces technical friction and improves long-term usability.

Security Tips

Security is an essential consideration when downloading and managing Blood Transfusion Procedure Checklist files. Digital documents obtained from unreliable sources may pose risks such as malware, corrupted files, or unauthorized content. Prioritizing security protects both your devices and personal data.

Avoiding pirated files is one of the most effective security measures. Unauthorized copies often lack quality control and may contain hidden threats. Legal and reputable sources provide verified files that are safe to download and use. Respecting copyright also supports creators and publishers, contributing to a sustainable content ecosystem.

Before downloading Blood Transfusion Procedure Checklist, users should verify the credibility of the source. Official publishers, academic libraries, and well-known platforms typically provide secure downloads. Checking website reputation, reading user reviews, and confirming licensing information help reduce risks.

Using antivirus or security software adds an additional layer of protection. Scanning downloaded files ensures that potential threats are detected early. Many modern security tools operate in real time, monitoring downloads and alerting users to suspicious activity. Keeping antivirus software updated enhances effectiveness against emerging threats.

Safe handling of digital documents

In addition to secure downloading, safe handling practices further reduce risk. Avoid enabling macros or scripts in PDF files unless necessary and trusted. Be cautious with files that request excessive permissions or prompt unexpected actions. These precautions help maintain device integrity and user privacy.

File Management

Effective file management ensures that your collection of Blood Transfusion Procedure Checklist remains organized, accessible, and easy to maintain. As digital libraries grow, poor organization can lead to confusion, duplicate files, and wasted time searching for documents.

Clear and consistent file naming is a fundamental aspect of file management. Including key details such as title, author, edition, or date in file names helps identify documents quickly. Consistency across all Blood Transfusion Procedure Checklist files prevents ambiguity and simplifies retrieval.

Using folders organized by topic, volume, subject, or date further improves clarity. For example, academic users may categorize files by course or discipline, while personal users may organize by interest or purpose. Logical folder structures make navigation intuitive and scalable as collections expand.

Tagging and labeling provide additional organizational flexibility. Many operating systems and cloud platforms support tags that allow files to be grouped across multiple categories. A single Blood Transfusion Procedure Checklist document can be tagged as reference, study material, or important, enabling faster searches without duplicating files.

Version control is particularly important when managing multiple editions or updates. Maintaining clear version identifiers prevents accidental use of outdated content. Archiving older versions separately ensures historical reference while keeping current materials easily accessible.

Maintaining an efficient digital library

Regularly reviewing and cleaning your library helps maintain efficiency. Removing

obsolete files, merging duplicates, and updating folder structures keep your Blood Transfusion Procedure Checklist collection streamlined. Periodic maintenance ensures that file management systems remain effective over time.

Archiving

Archiving Blood Transfusion Procedure Checklist files ensures long-term access and protects valuable information from loss. Digital documents can be vulnerable to accidental deletion, hardware failure, or software issues. Implementing reliable archiving strategies safeguards your collection for future use.

Cloud storage is a popular archiving solution due to its accessibility and automatic backup features. Storing Blood Transfusion Procedure Checklist files in reputable cloud services allows access from multiple devices while reducing the risk of data loss. Many platforms offer version history, enabling recovery of previous file states if needed.

External drives provide an additional layer of security for archiving. Storing backup copies on external hard drives or USB devices protects against cloud service disruptions or account issues. Keeping these drives in secure locations further enhances data protection.

A comprehensive archiving strategy often combines cloud and physical backups. Redundant storage ensures that Blood Transfusion Procedure Checklist remains accessible even if one storage method fails. Periodic verification of backup integrity confirms that archived files remain readable and complete.

Best practices for long-term archiving

- Use widely supported file formats such as PDF for longevity.
- Label archived files clearly with dates and version information.
- Maintain multiple backup locations.
- Review archives periodically to ensure accessibility.
- Update storage media as technology evolves.

Future-proofing your Blood Transfusion Procedure Checklist collection

Technology evolves over time, and file formats or storage methods may change. Choosing standard formats, maintaining backups, and staying informed about digital preservation practices help future-proof your Blood Transfusion Procedure Checklist collection. These steps ensure that documents remain usable and accessible for years to come.

Final thoughts on compatibility, security, and archiving

Managing Blood Transfusion Procedure Checklist effectively requires attention to compatibility, security, file organization, and archiving. By ensuring device support,

downloading from trusted sources, organizing files systematically, and maintaining reliable backups, users can protect their digital libraries and maximize long-term value. These best practices create a safe, efficient, and sustainable environment for accessing and preserving Blood Transfusion Procedure Checklist in the digital age.