

Venepuncture Policy

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1.0	April 2012	Yvonne Fenn and Rozi Hamilton		Venepuncture Policy
2.0	June 2017	Rozi Hamilton		Replaces the previous policy
3.0	October 2021	Rozi Hamilton		Replaces the previous policy

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Paragraph added on taking blood under mental capacity/ best interest decision	Absent from last policy	Rozi Hamilton	16/06/2016
Name changed to specify this is an Adult policy	Absent from last policy	Rozi Hamilton	17/07/2016

Executive Summary

Venepuncture is the procedure of puncturing a superficial vein in the upper limb with a needle, in order to obtain a blood sample for diagnostic purposes or to monitor a service user's condition and/ or levels of blood components (Dougherty and Lavery, 2015).

The Clinical Lead must ensure that the policy is shared with all new members of the team including bank & agency staff to enhance their awareness of ELFT policy and procedures. They must also ensure that all of their staff who are required to undertake venepun cture receive the required training, updates and have the met the competencies and have evidence of this in employment records.

Staff carrying out venepuncture must always follow this policy and must ensure that they maintain their competence through regular practice and three yearly updates. It is their responsibility to recognise the limits of their competence and refer to a more experienced practitioner if they have difficulty in carrying out the procedure. No more than two venepuncture attempts from a single practitioner should be made on a patient. This policy only applies to taking blood from adult patients

Staff are required to undertake a recognised training programme that incorporates theory, simulated practice and a period of supervised practice- under direct supervision of a competent practitioner. Formal assessment of 5 successful venepuncture attempts must be done under direct supervision and recorded on the supervised practice form (appendix 2). The member of staff must sign and date the declaration on the form. It is the responsibility of the staff member to seek an update or retraining if they feel their competence has decreased. These guidelines are from the RCN guidelines for infusion therapy (RCN, 2010). The guidelines are currently being reviewed and due to be published in 2022 so any change required will be updated once published.

Consent (verbal) must be given by the service user prior to venepuncture being carried out. The practitioner carrying out the venepuncture is responsible for informing the service using verbal or nonverbal language that they understand, the purpose of the blood test including; what the procedure involves, potential risks and side effects, when the results will be available and what potential consequences and treatments may be required as a result of the findings of the blood test. The person has the right to refuse to have the procedure carried out at any point and should not be put under pressure by the practitioner or the family if they refuse.

It is vital that the practitioner positively identifies the service user prior to undertaking the procedure by asking them to state their full name and date of birth. These details should be checked against the request form.

In exceptional circumstances it may be deemed necessary to use physical restraint in order to obtain a blood sample where, Mental Capacity is lacking and the individual is at dire risk of harm should the procedure not be done. In these circumstances a Mental Capacity assessment must be completed by a multi-disciplinary team and family members, followed by a best interest decision. For guidance please refer to the Trust Mental Capacity and Best Interest form on the intranet.

A single use tourniquet is used to identify an appropriate vein and make the procedure easier. The tourniquet must be applied 5-10cm above the chosen entry site and must be applied with enough pressure to compress the veins but not obstruct arterial circulation. The pulse must be palpable below the tourniquet. Once blood flow is achieved onto the bottle the tourniquet must be released. The tourniquet must not be left on for more than a minute as this will cause haemo-concentration which will cause erroneous test results leading to the test having to be repeated.

Before performing venepuncture both upper limbs should be inspected to select the most appropriate site for venepuncture. Appropriate veins should be identified in the following order; at the bend of the elbow of each arm (Antecubital Fossa) then on the back of each hand.

Veins within limbs that have been operated on and had axillary lymph nodes removed, those that have arteriovenous fistulae, phlebitis, lymphoedema or are affected by amputation, fracture or cerebrovascular accident are contraindicated for the purpose of venepuncture.

There are a number of potential complications of venepuncture. Use of veins in lower extremities is not routinely advised due to the higher risk of complications, particularly in service users with diabetes and coagulation disorders. This policy does not cover practitioners to take blood from feet and covers only venepuncture of the upper limbs (antecubital fossa, and hand).

On occasions when practitioners are unable to obtain blood from these sites - for instance service users who are Intravenous Drug Users - a risk assessment should take place and a local policy must be in place to guide the practitioner through the process. This policy pertains only to venepuncture of the upper limbs.

Complications of venepuncture:

Nerve damage and arterial puncture

Avoided by keeping the angle of entry of the needle to below 30°.

Pain

Avoid using veins in sensitive areas

Ensure skin cleansing agent is dry before puncturing the skin

Haematoma

Avoided by choice of an appropriately sized needle for the vein

Avoiding over advancement of the needle

Releasing the tourniquet as soon as blood flow is achieved

Pressing on the site as soon as the needle is removed for up to 1 minute to secure haemostasis.

Fainting

Check previous history and be alert for signs and symptoms during the procedure.

Infection

Clean the puncture site with 2% Chlorhexidine and 70% Isopropyl Alcohol for a minimum of 30 seconds prior to venepuncture and allow to completely dry before puncturing the skin. (Loveday et al, 2014)

Hands must be washed before and after the procedure using the NSPA 6 stage technique (appendix 3).

Disposable latex free gloves and aprons (in inpatient areas) must be used and discarded between patients (DOH, 2007, Loveday et al, 2014)

Vascular access equipment should have sharps injury protection. The mechanism must be activated immediately after use prior to disposal. Used disposable sharp objects must be disposed of in a sharps bin which complies to UN 3921 and BS7320 standards which should be placed near the patient and if required the patient's home. Handling of sharps must be kept to a minimum. Needles must never be bent, re-sheathed or taken apart prior to disposal (Loveday et al, 2014).

This policy includes guidelines for the order of draw of the blood bottles (from and a Blood Bottles and Order of Draw (as suggested by BD vacutainer guidelines) and the insertion procedure from the latest Marsden Manual of Clinical Nursing Procedures (Lister et al 2020)

Any untoward incident relating to the practice of venepuncture will be reported via the Datix reporting process. Managers will monitor Datix incident forms relating to venepuncture practice and will investigate and send staff for retraining if deemed necessary.

Managers will also discuss in one to one supervision whether a member of staff requires retraining due to decreased competence and confidence and also ensure that staff attend their three yearly updates.

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Introduction

East London Foundation Trust herein after referred to as 'ELFT' has a statutory duty to have in place appropriate policies to enable staff to fulfil the requirements of their role safely and completely.

This document sets out the standards to be followed by non-medical members of staff employed by Trust whose role involves venepuncture. For the purpose of this a non-medical member of staff is defined as a registered nurse, support worker or phlebotomy technician.

There is a need to provide a quality service to patients and clients in the community that is accessible and timely, in order that care and treatment is not unduly delayed in any department due to transport/mobility difficulties.

Venepuncture is the introduction of a needle into a vein to obtain blood for haematological, biochemical or bacteriological analysis (Lavery and Smith 2008). It is also one of the most routinely performed invasive procedures in healthcare and developing skills in venepuncture can facilitate holistic and timely treatment.

In order to perform venepuncture safely and effectively staff must achieve competence in theoretical and practical aspects of the skill. This can be provided locally with a programme devised through our educational Lead Nurse.

Purpose

The aim of this policy is to provide staff with the framework to enable them to perform venepuncture safely to a high standard where the need to perform venepuncture is part of their job role.

To ensure the staff perform to the best of their ability and to be able to meet and understand the demands on the service.

Definitions

Venepuncture or phlebotomy is the term used to describe the insertion of a needle into a vein in order to withdraw blood.

Venepuncture is a practical skill that can be used by a range of health professionals including registered nurses, registered nursing associates, midwives, phlebotomists, doctors and more recently health care assistants, SHINE staff and receptionists

Duties

Clinical Leads

All staff to work in accordance with all aspects of this policy. Policy should be shared with all new members of the team including bank & agency staff to enhance their awareness of ELFT policy and procedures.

To ensure staff who are required to perform venepuncture receive the appropriate level of training and support to meet venepuncture competencies. To also identify through IPR where staff may require updates including infection control.

To ensure relevant staff have achieved the competencies required for their work role with regards to venepuncture. (See attached appendix 1).

To maintain evidence of training and competency assessments within personal files and through IPR,

All Staff

To work at all times in accordance with the standards set out in this policy.

To undertake or demonstrate evidence of theoretical and practical training and competence before undertaking venepuncture for ELFT services.

To inform their line manager of any identified training needs in relation to venepuncture through 1-1's & IPR. It is staff member's responsibility to ensure their mandatory training needs are kept up to date in accordance with their contract of employment.

To recognise limits of their competence and experience and seek the help of a more experienced practitioner should they experience difficulty performing the procedure. Any problems that arise should be highlighted through the trust reporting mechanism of 'Datix'. If Venepuncture attempt is unsuccessful after two attempts the practitioner must summon a more experienced colleague to undertake the next attempt. Multiple, unsuccessful attempts are distressing for the patient and limit future vascular access

Where blood is required to be taken from children, specific paediatric practice should only be considered once the practitioner is experienced with adults. Additional competencies are required when taking blood from this client group.

Training

The staff member must undertake a recognised training programme, which incorporates theory, simulated practice and supervised clinical practice.

Following successful completion of the theory and simulated practice component of the training programme, the nurse may only practice Venepuncture under the direct supervision of a senior colleague who is experienced and competent in the procedure. When the staff member feels confident he/she must seek to be formally assessed.

Formal assessment and achievement of 5 successful venepuncture attempts must be undertaken within three months of attending the theoretical and simulated practice training programme (see appendix 1 for assessment record). If formal assessment and achievement are not successfully completed within the three month period, the staff member may make no further attempts at venepuncture. They must discuss the matter with his/her manager and undertake further training.

Formal assessment may only be undertaken once theoretical training and classroom simulated practice has been undertaken. Evidence of this, i.e. the certificate of attendance, should be viewed by the person undertaking the supervised practice in the clinical area. Supervised practice must be supervised by a member of staff experienced and competent in venepuncture. Assessment must be in line with the criteria found in appendix 1 and the assessment signed and dated on the supervised practice form (appendix 2) accordingly. Having successfully completed the formal assessments, the staff member must sign the declaration on the reverse of the assessment form.

A copy of the completed assessment form and declaration must be given to the manager of the service and (if relevant) to the Locality Manager for inclusion in the staff members personal record/file. The original training certificate and supervised practice assessment record should be retained by the staff member as evidence of completion.

Staff trained in venepuncture must attend a venepuncture update every three years and, in order to maintain competency, carry out the skill on a regular basis. If their level of competency falls they must seek re-training

Consent

A health professional that carries out a clinical procedure or treatment without first obtaining consent from the patient is at risk of legal action by the patient and action by their professional body. Consent must be given voluntarily by the patient who has capacity to give consent and has been fully informed as to the nature and purpose of the treatment (DOH (2010), ELFT Consent to treatment policy (2021).

It is important to ask the patient if they understand the need for the blood test and explain in terms that the patient/ client can understand if they do not. Information given to the patient should also include what the procedure involves, potential risks, side effects, when the blood results will be available and the potential consequences of the procedure I.E. Potential treatment (Lavery and Smith, 2008)

Consent may be given verbally or non-verbally and may be the act of the patient holding out their arm for the nurse to carry out a procedure, providing the patient has received appropriate information as to the purpose and risks of the procedure prior to this (DOH 2010).

A patient has the right to withdraw consent at any time and should not be put under undue pressure by their family or the professional to give consent. The decision to withdraw or refuse consent must be respected (DOH 2010).

Some tests require the patient to fast e.g. fasting glucose or fasting cholesterol. It is important to check that the patient has complied with the advice so that test results are interpreted correctly

(Scales, 2008). The Service User should be encouraged to drink plenty of water before the blood is taken as dehydration will effect superficial peripheral access. Drinking enhances venous filling and will make the procedure easier and more likely to be successful (Lister et al 2020)

Prior to performing venepuncture the practitioner must positively identify the patient by asking them to state their full name and date of birth and address checking these against the details on the request form, in line with the Trust policy for the Identification of Patients.

Mental capacity

In exceptional circumstances it may be deemed necessary to use physical restraint in order to obtain a blood sample where, mental capacity is lacking and the individual is at dire risk of harm should the procedure not be done. If there is doubt about a person's capacity to consent, a capacity assessment should be carried out by the person ultimately responsible for the procedure. This should be recorded on the appropriate electronic form (available in RiO, Systm1 and EMIS systems). If the outcome of the assessment is that the person lacks capacity to consent to venepuncture, then a best interest decision needs to be made, the process of which must follow the guidance set out in in the Trust's MCA policy and section 4 of the Act. The metal capacity act policy can be found:

http://elftintranet/sites/common/private/search_quick21.aspx?q=mental%20capacity%20policy&orderb_y=0&url=ObjectInContext.Show(new%20ObjectInContextUrl(2%2C34079%2C1%2Cnull%2C970%2Cundefined%2Cundefined%2Cundefined%2Cundefined%2Cundefined))%3B

Use of a Tourniquet

To make it easy to find and puncture a vein it is necessary to use a single use tourniquet. The tourniquet should be applied 5-10cms above the site of the intended venepuncture and should be tight enough to compress the veins but must not obstruct the arterial circulation of the limb. The pulse should be palpable below it. If the tourniquet is too tight and the arterial circulation obstructed then the flow of blood into the specimen tube will also be impaired.

If the arm becomes cyanosed, the tourniquet has been on too long and it should be immediately loosened and removed. The arm should be observed until it has regained normal colour and sensation

The tourniquet must be removed as soon as blood flow is achieved or after a maximum of 1 minute if difficulty is experience locating a vein. Leaving the Tourniquet on for longer than 1 minute leads to haemoconcentration which will cause test result errors. Haemoconcentration causes increases in serum calcium and potassium (Çuhadar S, 2013). This will lead to the blood test having to be repeated.

Site selection

Before performing venepuncture both upper limbs should be inspected to select the most appropriate site for venepuncture.

Inspection and palpation of the veins will reveal the position of the veins, direction in which they run and their size and other physical features. The vein should be straight and feel soft, cylindrical in shape and 'bouncy' when lightly pressed (Scales, 2008).

It is important to elicit as much information as possible before selecting the site selection as some cancer patients for whatever reason may not be able to give blood from certain sites. When taking blood from veins at the elbow, the patient's arm must be kept straight with the wrist extended and arm supported.

Veins should be looked for in the following order:

At the bend of the elbow of each arm (Antecubital Fossa)

- Median Vein
- Basilic Vein
- Cephalic Vein

In the forearm

Cephalic Vein

On the back of each hand

- Dorsal Vein
- Cephalic Vein

Site to avoid	Reason
Same side as mastectomy	Risk of infection due to lymphoedema
IV infusion running	Risk of inaccurate result from contamination of sample with IV fluid.
Arterial-Venous Fistula Sites	Surgically constructed site between vein and artery for renal dialysis
Hard, Sclerosed, Fibrosed and Thrombosed veins	Risk of failure of venous access and resulting failure to obtain blood sample with risk of need to repeat and painful for patient— use alternative site.
Phlebitis	Inflammation of vein, signs of redness, heat, tracking, swelling. Infection control procedures to prevent thrombo-phlebitis from developing
Sites of recent tattoos	Risk of inflammation and infection
Bruising	Limits access sites ensure pressure applied for 3 minutes post venepuncture. Failure to release tourniquet before removal of needle can cause bruising. May affect the quality of the sample
Cerebrovascular limb site	Avoid as altered sensation and circulation may result in pain or injury for the patient

High Risk areas for venepuncture

The wrist area must not be used for venepuncture because of the unacceptable risk of hitting the radial or ulnar nerve or artery which can cause temporary or permanent nerve damage and inability of the patient to open and close their hand (Ogden-Grabel and Gill 2005)

Veins within limbs that have been operated on and had axillary lymph nodes removed, those that have arteriovenous fistulae, phlebitis, lymphoedema or are affected by amputation, fracture or cerebrovascular accident are contraindicated for the purpose of venepuncture (Lister et al 2020).

Use of veins in lower extremities is not routinely advised due to the higher risk of complications, particularly in service users with diabetes and coagulation disorders (Lister et al 2020). This policy does not cover practitioners to take blood from feet and covers only venepuncture of the upper limbs (antecubital fossa, and hand).

On occasions when practitioners are unable to obtain blood from these sights - for instance service users who are Intravenous Drug Users - a risk assessment should take place and a local policy must be in place to guide the practitioner through the process. This policy pertains only to venepuncture of the upper limbs.

Complications

Nerve damage and arterial puncture caused by:

- Entering the vein at too steep an angle
- Poor vein selection (check for a pulse prior to insertion)

Pain caused by:

- Hitting a nerve or valve in the vein
- Poor technique
- Failure to allow skin cleanser to dry before venepuncture
- Use of large-gauge venepuncture device
- Use of veins in sensitive areas

Haematoma and bruising caused by:

- Entering vein at too steep an angle or over-advancement of the needle
- Needle too large for the vein
- Failure to release the tourniquet early enough
- Failure to secure haemostasis after needle removal

Fainting

- Check if patient has fainted before as this increases risk
- Keep alert during procedure for signs- pallour, sweating and light headedness
- If present remove needle, add digital pressure to entry site and ask patient to lower their head (if possible) below their heart

Infection

- Inadequate cleansing of the entry site
- Not allowing cleansed area to dry prior to procedure

Guidelines for Fasting Blood Specimens

- All fasting bloods must be taken before 11am unless otherwise directed by the patients GP
- Dextrose Tablets should be on hand in case of fainting or hypo-glycaemic attack.
- Before obtaining the specimen, the member of staff must check that the patient has fasted correctly.
- If not, the fasting procedure must be explained clearly by the member of staff carrying out the venepuncture and the client asked to return the next day
- The Service User should be encouraged to drink plenty of water before the blood is taken as dehydration will effect superficial peripheral access.

Equipment

- Single use Tourniquet
- Cleansing wipe containing 2% Chlorhexidine gluconate in 70% Isopropyl alcohol
- Non-sterile latex free gloves
- Request forms
- Blood bottles
- Specimen bag
- Local anaesthetic cream (if required)
- Safety sterile needle of appropriate size for the vein
- Blood collection system
- Cotton ball or gauze swab
- Tape or adhesive plaster
- Sharps container
- Needle holder
- Clinical waste bag (for gloves, wipes, etc)

Safe use and disposal of sharps

The use of Vacuum blood collection systems (E.G. Vacutainer) require the use of a Vacutainer holder to protect staff from sharps injury and to ensure that blood bottles are punctured correctly and supported during filling. These are single use items and should be disposed of immediately after use.

Vascular access equipment should have sharps injury protection which must be activated immediately after use prior to disposal. Used disposable sharp objects must be disposed of in a sharps bin which complies to UN 3921 and BS7320 standards which should be placed near the patient and if necessary in the patient's home. Handling of sharps must be kept to a minimum. Needles must never be bent, re-sheathed or taken apart prior to disposal (Loveday et al, 2014).

Infection Control

Venepuncture, however quickly completed, is a breach of the circulatory system, providing a means of entry for bacteria. An aseptic non touch technique (ANTT) must therefore be applied throughout the procedure (see infection control policy for more details). Details of ANTT procedure in the community can be found in Appendix 3. Any cuts or abrasions on the hands or arms must be covered up in advance of starting the procedure.

Hands must be washed before and after the procedure using the NSPA hand cleaning technique (appendix 3). Disposable gloves must be used for the procedure. Providing the practitioners hands are free from contaminants and visibly clean this may be done in the community with alcohol hand gel instead of soap and water. The venepuncture site must be cleaned with 2% Chlorhexidine gluconate in 70% Isopropyl alcohol for 30 seconds and allowed to dry completely (Loveday et al, 2014).

The infection control policy which contains more information about ANTT and Sharp disposal can be found here:

http://elftintranet/sites/common/Private/Community_View.aspx?id=404&pageid=4499&url=ObjectInContext.Show(new%20ObjectInContextUrl(2%2C65370%2C1%2Cnull%2C970%2Cundefined%2Cundefined%2Cundefined%2Cundefined%2Cundefined))%3B

Sharps Injury

For details on what to do in the event of a sharps injury please see appendix 4 or follow the link below: <a href="http://elftintranet/sites/common/private/search_quick21.aspx?q=sharps%20injury&orderby=0&url=ObjectlnContext.Show(new%20ObjectlnContextUrl(2%2C58271%2C1%2Cnull%2C970%2Cundefined%2Cundefined%2Cundefined%2Cundefined%2Cundefined))%3B

Monitoring

Any untoward incident relating to the practice of venepuncture will be reported via the Datix reporting process. The types of incidents that should be reported in this way are as follows:

- The patient suffers any of the following complications:
 - Heavy bleeding,
 - Arterial puncture
 - Nerve damage
 - Fainting
- Any of the sterile single use equipment is damaged or not fit for purpose
- The practitioner receives a needle stick injury
- Bloods are not labelled correctly
- Blood is collected in the wrong bottle

Managers will monitor Datix incident forms relating to venepuncture practice and will investigate and send staff for for retraining if deemed necessary. Managers will also discuss in one to one supervision whether a member of staff requires retraining due to decreased competence and confidence and also ensure that staff attend their three yearly updates.

Blood Bottles and Order of Draw

The following order of draw of specimens and mixing guidelines recommended by BD Vacutainer must be followed when drawing multiple tubes to avoid possible test error due to cross contamination from tube additives.

Sample tube colour	Additive	Laboratory Test	No of inversions at blood collection	Order of draw
	N/A	Aerobic followed by anaerobic- if insufficient blood for both culture bottles use aerobic bottle only	N/A	1 st
	Sodium citrate	Coagulation Tests, Heparin & Warfarin Control, Anti-Xa, Thrombophilia Screen, Lupus Screen, Confirmation Platelet Clumps	3-4	2 nd
	SSTII Clot activator and gel for serum separator	Routine chemistry, Endocrinology, Serology (viral, bacterial, parasite and fungal), Drug levels (Vancomycin, Gentamycin, Amikacin and Tobramycin) Immunology, B12, Ferritin, Serum Folate, EPO,	5	3 rd
	Clot activator	Serum Porphyrins, HIT, Screens, CDT, Fluoride, Thyroglobulin, Calcitonin	0 (plastic tube) 5 (glass tube)	4 th
	Sodium Heparin	Genetics, Homocysteine, Ammonia, Renin, Aldosterone, Gut Hormones/ Chromogranins	8	5 th
	EDTA	FBC, ESR, Sickle cell, Malaria, HBA1C, G6PD, Red cell Folate, Electrophoresis, Glandular Fever	8	6 th
	K2EDTA	Blood Group, Cross match.	8	7 th
	Potassium oxalate and sodium fluoride	Alcohol, lactate, glucose (if only glucose requested)	8	8 th

Any issues or incidents must be actively reported to both General Manager of service and a Datix alert generated. Patient's names must be included.

Associated Documents

The following documents are required to be used alongside this procedure:

- Practical assessment for Venepuncture (appendix 1)
- Formal Assessment for venepuncture

Venepuncture Action Rationale Insertion Procedure (Adult)

Action	Rationale
Approach patient, Introduce yourself and check patient identity- forename, surname, date of birth against blood form and obtains information regarding allergies (E.G. latex)	To ensure that you have the correct patient and the correct blood form
Give explanation and rationale for venepuncture to patient including reason for blood test.	Information giving is a vital aspect of informed consent to a procedure (DOH 2010) and the patient has a right to a full explanation of care (DOH 1995).
Information giving must include post- procedure care including the requirement to report pain, swelling, discomfort.	Venepuncture is an anxiety provoking procedure so it is important to reassure the patient, and ensure they understand their care needs and how/ when to report problems (Lavery 2003)
Ask patient about previous history with venepuncture, including any fainting, allergies or possible contraindications to using either limb. Check for preferences, previous problems and allow the patient to ask questions	To involve patient in choices about the procedure and check for any history that may predispose the patient to complications or prevent the use of either limb, E.G mastectomy (Lister et al 2020) Ensuring the patient is relaxed will prevent anxiety, which can cause vasoconstriction (Lister et al, 2020)
Ensure work area is clean. If necessary clean surface with soap and warm water or a detergent surface wipe. Wash hands using soap and water or alcohol hand gel, following National patient safety agency 'clean your hands campaign' 6 stage technique (appendix 3)	To prevent cross infection and contamination Hands must be washed before and after patient contact and before carrying out any clinical procedure to prevent infection (RCN, 2010; Loveday et al, 2014).
Prepare equipment to be used safely, applying the principles of asepsis and checking sterility and use by date	To prevent cross-contamination, sharps injury. reduce risk of contamination and inoculation injury
Take into account size of needle or butterfly required with regard to the condition of veins	To prevent complications and increase chances of venepuncture being successful

Action	Rationale
Adjust environment to comfortable working height and ensure adequate lighting- wherever possible	To prevent back strain and ensure that s/he can see adequately to facilitate the procedure
Ensure patient is comfortable and consents to procedure	Patient comfort will prevent movement and so facilitate the procedure. Consent to treatment is a legal requirement (DOH 2010)
Select non-dominant arm wherever possible.	If dominant arm is selected there is greater risk of bleeding post procedure
Rest the arm on a pillow if possible	To increase comfort and facilitate venous access (Lister et al 2020)
Avoid veins that are inflamed, infected or sclerosed	Inflamed and sclerosed veins are difficult to obtain blood from.
Explain to the patient that they need to have a tourniquet applied. Use a single patient use tourniquet and select an appropriate vein in ante cubital fossa area	To inform the patient and prevent unnecessary distress. Reusable tourniquets have been known to be contaminated with blood and carry staphylococcus aureus and MRSA (Rourke et al, 2001).
Apply the tourniquet 7-8cm above the venepuncture site, ensuring it is not tight enough to obstruct arterial supply. The radial pulse must be still palpable	To obstruct venous return to dilate the veins and make them more prominent. (Lister et al 2020) Obstruction of arterial flow will cause the veins to collapse and distress the patient (RCN 2010)
If the tourniquet does not increase venous distention you can ask the patient to lower their limb below the level of the heart, clench their fist and you can gently palpate and stroke the vein	To improve venous access (Lister et al,2020)
Palpate the chosen vein to assess the size depth and condition	To avoid inserting the needle into anatomical structures such as arteries, nerves and valves (Lister et al 2020)

Action	Rationale
Remove the tourniquet	To ensure patient is comfortable and prevent haemo-concentration leading to inaccurate results (Lister et al 2020). Çuhadar, 2013).
If it is not possible to confidently identify an appropriate vein the attempt to take blood must be abandoned and the patient referred to a senior or more experienced colleague.	To prevent the patient distress and the risk of limiting further venepuncture attempts
The reasons why the venepuncture was not attempted must be clearly documented in the patient notes and reported to the GP/ team leader or nurse in charge (whichever is appropriate)	To ensure that the patient is appropriately referred on to have the procedure
Select the appropriate venepuncture device for the size depth, amount of blood to be taken and site of the vein to be used. For a metacarpal vein a butterfly device is required	To prevent trauma and damage to the vein and haemolysis (Lister et al 2020)
Wash hands again with alcohol hand gel using NPSA clean your hands campaign 6 stage hand washing technique	To maintain asepsis. Hands have been contaminated during vein selection.
Don well-fitting latex free gloves	Personal protective equipment is required for this procedure as risk of exposure to blood is high risk (Loveday et al, 2014).
Re-apply the tourniquet above the vein entry site to be used	To impede venous return to increase their prominence (Lister et al 2020)
Clean the skin in a circular motion outwards from the intended entry site for 30 seconds using 2% chlorhexidine gluconate in 70% isopropyl alcohol and allow to dry completely. Do not repalpate or touch the skin	To reduce prevent recontamination of the entry site and reduce the risk of infection (Loveday et al (2014)
In patients who are sensitive to chlorhexidine gluconate and/ or isopropyl alcohol use providone- iodine application Do not blow or fan the area dry and do not palpate the vein again after cleaning	This will contaminate the area and lead to increased risk of infection (Lister et al, 2020)

Action	Rationale
Assemble vacutainer needle and needle holder as per manufacturer's instructions Remove the cover from the needle and inspect for defects	To ensure that all equipment is to hand to facilitate ease of procedure and to prevent contamination/infection from out-of-date stock To detect faulty equipment. If the needle is bent or bared place in a safe container and return to manufacturer with information regarding batch details (Lister et al 2020)
Manually stabilise the vein by anchoring the skin a few CM below the chosen entry site without contaminating the cleaned area	To prevent movement of the vein and increase the likelihood of success (Lister et al 2020)
Remove the needle shield and, with the bevel of the needle pointing upwards insert the needle into the vein at an angle of 30° or less depending on the size of the vein	The bevel needs to be upwards to facilitate smooth transition through the skin and vein. Keeping the angle low will reduce the risk of nerve damage is unlikely (Arbique and Arbique, 2007)
Reduce the angle of the needle as soon as you feel the resistance change or flash back is seen along the tubing of the venepuncture device	To prevent advancing the needle too far into the vein wall (Bowden 2010)
Slightly advance the needle into the vein	To secure the devise and prevent displacement (Bowden 2010).
Firmly connect the blood container to the hub of the vacutainer and allow the bottle to fill with blood to the required level. As soon as blood is flowing the tourniquet can be loosened	It is no longer necessary and prolonged tourniquet usage may lead to inaccurate blood test results (Çuhadar, 2013).
Hold the vacutainer holder securely while collecting the blood and changing the bottles	To prevent the equipment from becoming dislodged (Bowden 2010)
Use correct order of draw with the blood bottles (see blood bottles and order of draw section on p12)	To prevent contamination of tubes without additives from the tubes that contain additives (Bowden, 2010)
While each tube is filling the previous tubes should be gently inverted. Those with dry additives require 5 inversions. Those containing liquid additives need to be inverted 6-9 times. Invert as per manufacturers guidelines	To ensure that the additives are properly mixed in with the blood to ensure their efficacy
Action	Rationale
Release the tourniquet before removing the last bottle. Do not apply pressure on the site until the needle has been removed	To prevent occurrence of bleeding and haematoma (Bowden, 2010. Lister et al 2020)
It may be necessary to remove the tourniquet as soon as blood is flowing to	Calcium levels and other results can be affected by haemostasis and prolongued

avoid inaccurate results arising due to haemostasis	tourniquet pressure (Lister et al, 2020) NICE 2019
Immediately engage the sharp safety mechanism and discard the stylet in the sharps bin	To meet health and safety requirements by preventing sharps injuries
Apply digital pressure to the puncture site until bleeding has stopped. In patients with clotting disorders or who are on anticoagulant medication haemostasis can take over 1 minute	To stop bleeding and prevent haematoma formation (Lister et al 2020)
If appropriate you can instruct patient to do this and to avoid bending their arm if the antecubital fossa has been used	
Gently invert the blood tube for the number of times appropriate for the bottle (see table on p12)	To mix the additives into the blood without damaging the blood cells (Lister et al, 2020).
Carefully label the bottles and place in the plastic bag/ container for laboratory samples	To ensure the bloods are correctly labelled and prevent identification errors. Laboratories have a zero tolerance to labelling errors and sample bottles that do not have a minimum of three identifiers. illegible or misspelt information on blood tubes and request forms lead to patients receiving incompatible blood and treatment (Davidson & Bolton-Maggs (2014)
Inspect the venepuncture site before covering it with a dressing.	To ensure the site has sealed
Ensure patient is not allergic to adhesive plaster before applying.	To prevent allergic reaction and prevent further bleeding from the site. (Lister et al 2020).
Ensure the patient is comfortable and does not have any symptoms or questions. Explain to the patient how to recognise infection and other complications	To be able to recognise and/ or treat problems before leaving them Patients are usually the first to notice any
Dispose of any waste appropriately	side effects and this will lead to prompt treatment
Remove gloves and wash hands again using NPSA clean your hands campaign 6 stage hand washing technique	Handwashing is required following removing gloves (Loveday et al 2014).
If two venepuncture attempts are unsuccessful the attempt must be abandoned and the patient referred to a senior or a colleague more experienced in venepuncture to take over the procedure	To prevent the patient distress and the risk of limiting further venepuncture attempts

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Appendix 1

Practical Assessment for Venepuncture

CORRECTLY DEMONSTRATE THE FOLLOWING ON 5 SEPARATE OCCASIONS	TICK BOX
Has attended approved recognised theoretical training including simulated practice	•
using the use of medical devices used in venepuncture	
Certificate provided as evidence	
Demonstrates adequate knowledge by correctly answering questions on:	
Relevant anatomy and physiology, site selection-including contraindications and	
how to select an appropriate vein	
Consent, mental capacity and patient information giving	
Side effects and complications	
How to deal with complications- fainting, arterial and nerve puncture	
Infection control	
Sharp safety and what to do in the event of needlestick injury	
Demonstrate how to prepare the single use equipment for venepuncture	
 Choose appropriate venepuncture equipment for patient needs. 	
 Assemble appropriate equipment on a clean trolley i.e. vacutainer and needle 	
attachment, butterfly, sharps bin, tourniquet, gloves, blood bottles, skin cleaning	
prep, cotton wool and adhesive tape.	
Describe how to prepare a patient for venepuncture	
Explain the procedure in simple terms and position the patient comfortably	
Explains the reason and purpose for the blood test	
Obtain informed consent	
Check for any known allergies	
Checks the identity of the patient	
Describe how the practitioner should prepare for the procedure	
Hand washing technique	
Wear clean gloves and apron	
 Ensure adequate lighting and posture of the patient and self 	
Select appropriate vein for venepuncture	
 Apply tourniquet 5-10cms from the intended puncture site applying enough 	
pressure to obstruct venous but not arterial flow	
 Encourage venous filling by: ask patient to open and close fist, lower arm below th 	е
level of the heart, massage site, apply warm compress (if necessary)	
Palpates the vein.	
Demonstrate the preparation of the puncture site	
Ensure the area is clean and dry.	
 Use 2% chlorhexidine gluconate in 70% isopropyl alcohol to clean the skin around 	t
the entry site for 30 seconds	
Demonstrate how the venepuncture equipment is appropriately assembled for use	
and how it should be handled.	
Ensure package and contents are intact	
Check expiry date	
Fold down wing of butterfly if used	
Check bevel of needle is uppermost	
Ensure the needle is not contaminated before use	
Demonstrate needle insertion	
 Immobilise limb and apply traction to skin in order to anchor vein 	
 With bevel uppermost insert needle at an angle of 30 degrees (depending on dept 	th
of vein)	

Avoid touch contamination of the insertion site and aseptic non touch technique Attach the blood bottle to vacutainer to obtain blood sample, in the correct order of Once all samples are collected release the tourniquet and cover needle site with cotton wool. Apply pressure once the needle is withdrawn for 30-60 seconds to prevent bruising. • Check the site (if clotted, apply tape over cotton wool) **DEMONSTRATE SHARPS DISPOSAL** • Able to engage safety mechanism if present Dispose of sharps immediately into appropriate sized sharps bin DEMONSTRATE CORRECT HANDLING OF BLOOD SAMPLE BOTTLES Correct order of draw Agitate bottles as required • Correctly label, date and time the bottles Send the bottles appropriately package for transport to the pathology lab Demonstrate correct disposal & decontamination of equipment • Demonstrate correct disposal of equipment • Demonstrate safe clearing of blood spillages • Demonstrate correct decontamination of hands following procedure

Name of Candidate:	
Signature of candidate	
Date:	
Name of Assessor:	
Signature of assessor	
Achieved	Not Achieved
Recommendations	

Appendix 2

Venepuncture (Adult) FORMAL ASSESSMENT

Name	e					
Date	traini	ng pro	ogramme	attende	d	

1) Date:

I certify that the above named competently & unaided performed venepuncture in line with the criteria specified in the Trust Policy Signed

Name and Title (Block Letters)

2) Date:

I certify that the above named competently & unaided performed venepuncture in line with the criteria specified in the Trust Policy Signed

Name and Title(Block Letters)

3) Date:

I certify that the above named competently & unaided performed venepuncture in line with the criteria specified in the Trust Policy Signed

Name and Title (Block Letters)

4) Date:

I certify that the above named competently & unaided performed venepuncture in line with the criteria specified in the Trust Policy Signed

Name and Title (Block Letters)

5) Date:

I certify that the above named competently & unaided performed venepuncture in line with the criteria specified in the Trust Policy

Signed

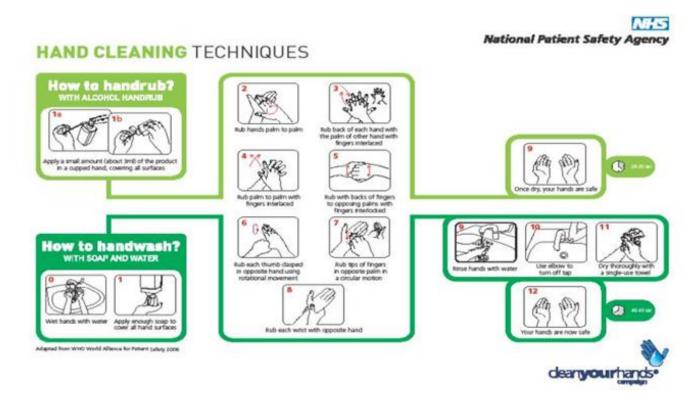
Name and Title (Block Letters)

Declaration

To be filled out by practical assessor: Five competent adult intravenous peripheral cannulations have been performed
Signature
To be filled out by staff member: I confirm that I am competent and have the requisite knowledge to carry out venepuncture and will seek retraining and supervised practice if my competence level is not maintained
Signature Print
Date

Appendix 3

NHSPA hand Cleaning Technique and community ANTT





Community Peripheral Venepuncture





INFORMATION ON SHARPS PROCEDURE

For All Sharps/Splash Contamination Injuries IMMEDIATELY Contact Team Prevent's Clinical Sharps Line:

Monday-Friday (08.30am-16.30pm) - 01327 810 777 Out of Hours - 0800 413 324

SHARP/SPLASH SAFE

1. FIRST AID:

PROCEDURE FOR SHARP/NEEDLE-STICK INCIDENTS

- ENCOURAGE BLEEDING BY SQUEEZING WHERE SKIN IS PUNCTURED
- WASH THOROUGHLY WITH SOAP AND WARM WATER, DO NOT USE A SCRUBBING BRUSH

PROCEDURE FOR SPLASH BY BLOODY OR BODY FLUIDS

- IF EYES OR BROKEN SKIN AREAS ARE INVOLVED, WASH IMMEDIATELY WITH WATER.
- IF MOUTH IS INVOLVED, RINSE WITH PLENTY OF WATER BUT DO NOT SWALLOW

2. CONTACT OCCUPATIONAL HEALTH - TEAM PREVENT IMMEDIATELY:

- MONDAY-FRIDAY (08.30am-16.30pm) 01327 810 777
- OUT OF HOURS 0800 413 324

3. MAKE SURE YOU:

- INFORM YOUR LINE MANAGER OR DUTY NURSE
- SUBMIT AN INCIDENT REPORTING FORM ON THE TRUST INTRANET

For details of specific details based on your directorate please visit the intranet:

http://elftintranet/sites/common/private/search_quick21.aspx?q=sharps%20injury&orderby=0&url=ObjectlnContext.Show(new%20ObjectlnContextUrl(2%2C58271%2C1%2Cnull%2C970%2Cundefined%2Cundefined%2Cundefined%2Cundefined%2Cundefined))%3B

Appendix 5

Venepuncture operational policy for phlebotomists

Band 4 Lead Phlebotomist to ensure all sites are adequately staffed, maintaining accurate records of all annual leave & Sickness. Reporting any difficulties directly to the General Manager.

To ensure that e-roster reflects staffing levels at all times. Or managers need to ensure that staffing levels and skills are available to provide the service to clients/ patients

To be able to communicate effectively with clients at all times, maintaining a professional approach at all times. Any arising issues should always be referred to the 'Centre Manager' of that site and if necessary elevated up to the General manager of that service.

ENVIRONMENT

Venepuncture should take place in the designated non-carpeted clinical rooms with facilities for hand washing and sharps and clinical waste disposal.

All patients arriving for a blood test at health centre are directed to the ticket machine either by reception staff or by adequate signage within the reception area.

Patients booked for a GTT will have an appointment time. Reception staff will advise the Phlebotomist that the patient has arrived. These patients should be given priority on arrival. Other waiting patients should be informed of any other priority.

All patients sent to phlebotomy and are known to have been diagnosed or suspected of carrying in infectious deceases such as chicken pox, shingles etc.

Paediatrics

1.	Venepuncture should only be offered in clinics to children over 4, and undertaken by adequately experienced phlebotomists.
2.	All children under the age of 4 should be referred to Newham University Hospital.
3.	Explanations should always be given to the parent/carer in advance of any conversations with the child.
4.	The phlebotomist's should aim to establish a rapport with the child, in order to gain the child's confidence and to give necessary reassurances before carrying out such a procedure, and should allow sufficient time to do so, using diversional therapy where possible.
5.	For very young children (under 12) a butterfly needle should be used, in order to limit the risk of venous collapse/unexpected movement causing damage.
6.	For children over 12 only the Vacutainer system or syringe and needle may be used when taking blood, if thought necessary a butterfly needle may be used.

END OF SESSION RESPONSIBILITIES:

To ensure all samples are dispatched correctly to lab
To clear away and lock up all equipment and dispose of clinical waste as per Infection Control
policy.
To leave room tidy and furniture as required by clinic.

ELECTRONIC BLOOD TEST REQUEST (EPR)

Only these Phlebotomists that have been trained in the use of the EPR system and have the appropriate personal code will have access to the system. Agency and temporary staff will not. Patients attending for blood tests at sites that are being temporarily 'covered' by agency staff only will need to be directed to one of the other sites.

Please refer patient to Clinical Administrator who will deal appropriately.

Log onto system and retrieve label from printer. Peel label from printer 1 label down to ensure that there is no blocking of the printer Read label carefully.

Check identification with patient.

Do not take sample if unsure of identification.

Place the label on the appropriate bottle, ensuring in correct place. Write name on bottle for audit purposes. Take blood.

Continue following venepuncture procedures as above.

CHECKING OF BLOOD SAMPLES

Two people to check bloods are labelled and bar coded correctly and tally with paperwork (count number of bottles) – either 2 phlebotomists or a phlebotomist and administrator for independent verification.

When bloods are packed into large bio hazard bag, please tape bag closed and sign on tape by the w people checking bloods.

Two people (Phlebotomist and admin staff) to sign as bloods put into red box

Phlebotomist to sign blood handed over to driver, copy to be kept on site.

Blood boxes to be double checked to ensure blood samples are in the box to be transported back to Path Lab.

Driver to sign he accepted the blood (Number of boxes) before he leaves the building.



Appendix 5

Equality Analysis Template

Part 1: Equality Analysis Details	
Title of 'Proposal' (The term proposal covers activities such as such as policy development, policy review, service redesign and internal reorganisation or restructuring processes).	Venepuncture Policy
Name of directorate	Community Health Newham Directorate
Name o manager undertaking the Equality Analysis	Rozi Hamilton
Consultation date/s with staff	Not Applicable
Consultation date/s with service users	Not Applicable
Date Equality Analysis Completed	15 th September 2021

Review date		
(Review at least once every	three	years)

8th October 2015

Part 2: Proposal Details

1) What are the aims of the proposal? Indicate if this is a new proposal or the review of an existing one?

(The term 'proposal' covers activities such as such as policy development, policy review, service redesign and internal reorganisation or restructuring processes)

To provide evidence based policy to guide phlebotomists, nursing staff and care support workers to safely and competently carry out venepuncture on patients and clients in the trust

2) Provide a summary of the current activity to which the proposal relates e.g. policy or service structure and provision and the reasons for the changes being proposed? (State if the proposal involves relocating a service to another site; extended service hours; puts staff at risk or involves significant change)

New policy to guide venepuncture practice

Part 3: Equality Analysis of Staff		
 Identify the impact or potential impact on each of the following protected groups, with due regard to the three aims of the PSED (public sector equality duty). 	Impact Positive or negative? or no impact?	Please describe the process of your analysis with reference to the following: Results of consultation Data or research on the protected groups that you have considered Implications for the protected groups
Age: different age groups	No Impact	
Disability: (Consider a range of impairments, including - sensory, mental, physical and learning disability)	No impact	
Sex: men and women	No impact	Nothing required
Religion or Belief: (including no belief)	No impact	Nothing required
Sexual Orientation: people who are gay, lesbian, bisexual or heterosexual	No impact	Nothing required
Race: including ethnicity and nationality	No impact	Nothing required
Gender Reassignment transgender people	No Impact	Nothing required
Pregnancy and Maternity	No impact	Nothing required
Marriage and Civil Partnership	No impact	Nothing required

Part 4: Equality Analysis of Service Users / Patients			
Protected Groups (Equality Strands) Identify the impact or potential impact on each of the following protected groups, with due regard to the three aims of the PSED (public sector equality duty).	Impact Positive or negative? or no impact?	Please describe the process of your analysis with reference to the following: Results of consultation Data or research on the protected groups that you have considered Implications for the protected groups	
Age: different age groups	Negative	Only covers those aged over 16 years for safety purposes	
Disability: (Consider a range of impairments, including - sensory, mental, physical and learning disability)	Positive	Sensory and circulatory impairment is considered in the policy	
Sex: men and women	No Impact	Nothing required	
Religion or Belief: (including no belief)	No Impact	Nothing required	
Sexual Orientation: people who are gay, lesbian, bisexual or heterosexual	No Impact	Nothing required	
Race: including ethnicity and nationality	No Impact	Nothing required	
Gender Reassignment: transgender people	No Impact	Nothing required	
Pregnancy and Maternity	No Impact	Nothing required	
Marriage and Civil Partnership	No Impact	Nothing required	

Use this space provided below to elaborate on your decision based on the findings of the equality analysis 1. Accept the proposal - no evidence of discrimination and appropriate opportunities have been taken to advance equality and foster good relations 2. Continue the proposal - despite adverse effects or taking opportunities to advance equality provided the proposals do not unlawfully discriminate and can be objectively justified. (To identify whether a proposal may unlawfully discriminate due regard should be given to discrimination on the basis of the protected characteristics)

Part 6: Equality Analysis Action Plan	
Adverse Impact – Staff	Please describe the actions that will be taken to mitigate this impact
None Identified	Non required
Adverse Impact – Service Users	Please describe the actions that will be taken to mitigate this impact
None identified	None required