Central Catheter Care Clinic

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Central catheter care clinic at The Gujarat Cancer and Research (GCRI) is run by trained Central Venous Access Device (CVAD) Nurse. In Central Venous Catheter (CVC) care clinic, two trained staff have been working and both have taken training from TATA Memorial hospital Mumbai. GCRI is under the administrative responsibility of the comprehensive care of cancer.

Introduction

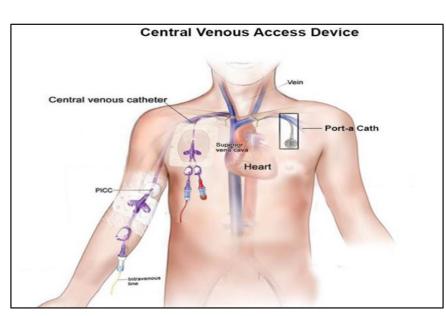
For decades, access devices have been used to deliver complex and diverse treatments to patients with cancer. IV therapy is an integral part of modern medicine and nursing, as it is practiced in every healthcare setting, from hospital to home. A new generation of access devices are quickly being adapted to provide a safe means to administer therapies in to body system.

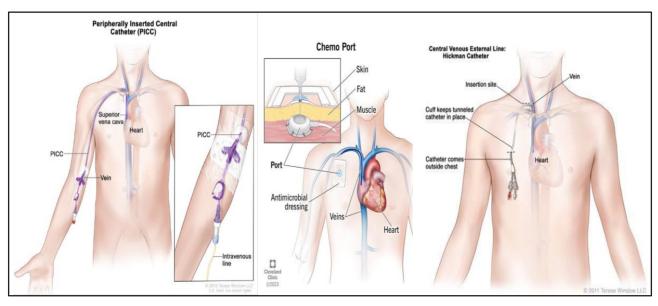
GCRI has a fully developed functional central catheter clinic which aims to provide comprehensive care to patients and is involved in first line research and believes that will help trained nurses to take keen interest with confidence and responsibility in patient care. These clinics play crucial role in ensuring the optimal function, maintenance and safety of these devices, which are vital for the delivery of intravenous medications, fluids and therapies. Nurses in CVC care clinics are integral members of the healthcare team, providing comprehensive care and support to patients with CVADs. Their role encompasses various responsibilities aimed at optimizing patient outcomes and enhancing quality of life.

Clinical services provided at CVC care clinic

- 1. Assessment and monitoring
- 2. Post insertion counselling
- 3. Education and training
- 4. Care and maintenance
- 5. Collaboration and communication
- 6. Management of complications
- Home going instructions like, Bathing Clothing Dressing Flushing Cap changing Travelling

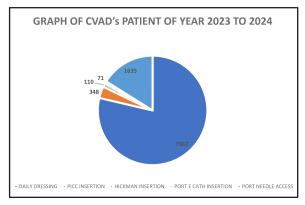
Keeping detailed record of indoor & outdoor patients





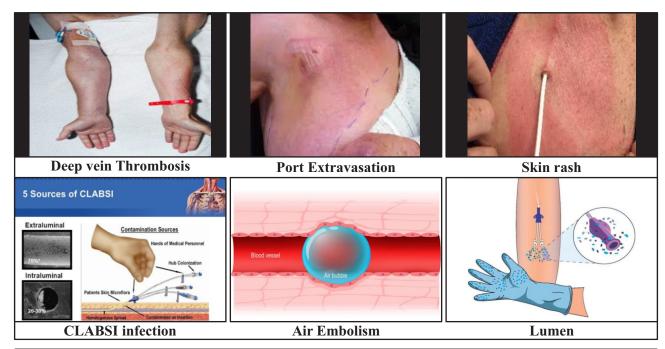
Record Of Cvad's Patient of Year 2023 To 2024

Daily Derssing	PICC Insertion	Hickman Insertion	Port E Cath Insertion	Port Needle Access
7982	348	110	71	1635



Complications of Long-Term Venous Access Devices

- 1. Non-infectious complications like air embolism, arrhythmias, brachial plexus, arterial puncture, venous perforation, cardiac tamponade, catheter fracture, catheter tip malposition, exit site bleeding or hematoma, catheter occlusion, deep vein thrombosis
- 2. Infectious complications like catheter related blood stream infection, phlebitis, extravasation, lumen infection, exit site infection, skin rash and skin injury



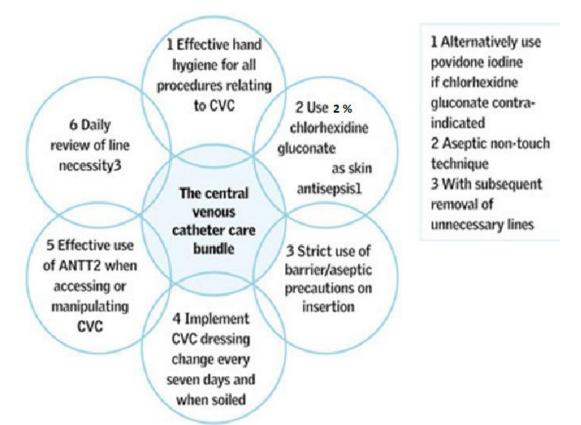
CVAD Complication images:

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Managing complications related to CVADs involves various approaches, depending on the specific encountered. Regular assessment, vigilant monitoring, and prompt intervention are key components of managing complications associated with CVADs. Additionally, evidence based guidelines and protocols to optimize patient outcomes.

Education and documentation for access devices

- Staff training and education
- Patient documentation
- Legal standard of care
- Continuing competence and professional improvement
- Care and maintenance of access device
- Essentials for patient and caregiver education
- Demonstration of self-care skills related to access device as appropriate
- Additional resources for the patient and caregiver



Main types	Characteristics	Duration of Use	Advantages	Limitations	Schematic representation
Tunneled central venous catheter (Hickman [®] , Groshong [®] , Broviac [®]).	-Distal end open to the outside with subcutaneous (tunneled) way. -A Dacron cuff attached to the line induces a local fibrotic reaction and anchors the cuff to the tissues.	Months to years	-Longer duration. -Lower risk of infection and thrombosis.	-Access for insertion needs medical radiology, surgery or anesthesia equipment. -Higher cost. -Limited flow.	
Central venous access device with subcutaneous reservoir (Port or port-a- coth type).	-Special tunneled venous line connected to a subcutaneous reservoir. - A non-coring needle Is needed to access the thick port membrane	Months to years	-Longer duration. -Lower risk of infection and thrombosis. -Comfortable and cosmetic (no visible line).	-Access for insertion needs medical radiology, surgery or anesthesia equipment. -Need for special training/equipment for nurses to access -Higher cost. -Limited flows. -6 weekly flushing, heparin locking -Access to device requires skin puncture each time.	
Peripheral insertion central catheter (PICC type).	-Line is inserted by a peripheral vein (basilic, cephalic, etc.) passing through the arm. Correct tip location: superior vena cava/right atrium junction.	Months	- Easier to insert and remove by trained nurses. -Lower cost.	-Increased risk of infection. -Increased risk of thrombosis. -Requires weekly care by trained nurses.	