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Introduction: Central venous access positioning and its management represent one of the achievements in a cancer patient. Moreover, the prevention and the control of catheter related complications are the main objectives for any Cancer Institutes. To support the dressing's management of the cancer patients with central venous access, the Institute for Cancer Treatment and Research of BARI in ITALY, proposes a training session and a continuous collaboration between medical and nursing staff, caregivers and patients.
Method: During the first dressing the patient is informed about the complications of central venous catheter and the good practices for the dressing's management. Moreover, the patient receives a checklist of the catheter related injury and the devices recommended by international guideline. Then the patient is invited to photograph any change of dressing and to send these pictures to a dedicated email address. The dressing's management outpatient evaluates the pictures and publish the most significant photos on the site of the Cancer Institute.
Results: The daily review of central venous access assessed by a photographic archive improved by the dressing's management outpatient in hospital and by the patients at home. This photographic documentation can be updated (daily, if necessary) by the patient or the caregiver in case of suspected catheter related complications.
Discussion and conclusion: The introduction of a photographic archive and the collaboration between patient and caregiver improve the prophylaxis of the catheter related complications and promote the good practices in the central venous access management.

P084

PICC migration – A problem of the past

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Introduction: The number of patients requiring central venous access continues to increase as the management of Oncology and Haematology advances and life expectancy is prolonged. The combination of venous access and Systemic Anti-Cancer Therapy (SACT) results in a large population of patients who have varying levels of care and complications related to venous access.
Infusional Services introduced the Subcutaneous engineered stabilisation device (ESD) as an alternative PICC stabilisation device with a goal to reduce dislodgement and catheter movement associated complications.
Method: A cross-sectional analysis comparing all PICCs placed in 2013 were compared to the post-intervention period beginning 2015. The Subcutaneous ESD was introduced in June 2014 allowing 6 months of learning curve before data collection resumed. All patients were monitored for migration and dislodgement using a PICC History Sheet and an electronic patient database.
Results: In 2013, there were 1111 PICCs placed. During this period 66 PICCs had migrated that resulted in catheter replacement, calculated as a 6% re-insertion rate.
In 2015, 1139 PICCs were placed with no migrations or replacements, 0% dislodgement and re-insertion rate. There were no statistically relevant differences between the patients in the two groups based on diagnosis, sex, age or placement of catheter.
Discussion and Conclusion: The introduction of Subcutaneous ESDs has resulted in significant benefits for the patient, practitioner and Trust. It eliminated PICC migration and the need for PICC reinsertion. Subcutaneous ESDs have reduced delays to therapy and the potential for increased bed occupancy.
Subcutaneous ESDs offer a safe, effective, and economical alternative of PICC securement for patients who are not only unable to tolerate Adhesive ESDs, but also reduces risks for all PICCs such as migration, dislodgement and consequential thrombosis and infection. Additional prospective research is needed to assess the direct impact of Subcutaneous ESDs on PICC-associated infection, occlusion and thrombosis complications.

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P085

Validation of magnetic tracking system method – ECG driven vs. X-ray control and cost implications.

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Introduction: A prospective and observational study, focused on validation of the magnetic-ECG method for PICC positioning. To evaluate:

- the primary malposition rate of PICCs inserted with the help of Sherlock 3CG System®,
- the accuracy of the anthropometric measurement,
- the economic cost implications of the whole process.

Methods: Study took into account patients aged 16 years and older and excluded patients with atrial fibrillation, atrial flutter or severe tachycardia.
Tools used were "Sherlock 3CG - TipConfirmation System" associated to Site Rite 8 - Bard® ultrasound system and chest radiography. An Excel® sheet has been created for collection of personal data and data related to position of the CVC.
Results: 2 malposed catheters on 451 implants: one of which not confirmed by the radiographic check two days later, the other on an obese patient. Anthropometric measurement had an average discrepancy of 0.51 cm from the evaluation of the Sherlock 3CG System®.
Analyzing the PICC implant procedure with the Sherlock 3CG System® control resulted in economic benefit and employee's time saving.
Discussion and Conclusions: The intracavitary electromagnetic path allows a correct and accurate PICC positioning. Use of the anatomical point the repere "third intercostal space parasternal right" results in an underestimated approximation of 0.5 in Picc's lenght. It results that it is possible to use the fourth rib in the right parasternal junction as an anatomical reference.
The use of Sherlock 3CG System® generates economic savings and guarantees protection for the operator.

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P086

The removal of a stuck catheter: Our 5 years experience with Vollmar ring

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Introduction: The use of the tunneled central venous catheter is steadily increasing worldwide as a means of vascular access for hemodialisys. The increased use and the extended dwell time are associated with more frequent complications. Among these, one of the worst is the "embedded" or "stuck" catheter. This is when the catheter cannot be normally removed. Below is our 5 year experience using a Vollmar ring as an alternative.
Method: In the Vascular Surgery ward in Ancona Hospital, during the five-year period 2013-2017, we dealt with 220 cases of removals and replacements of Central Venous Catheters (CVCs). In 4 cases we experienced problems with stuck catheters, which were solved using a Vollmar ring. This different approach enabled us to remove the CVC thanks to the breakage of the synechiae that kept it stuck to the wall. All procedures were carried out while the patients were sedated but conscious. In all procedures the removal of the stuck CVC was carried out using a Vollmar ring, but in the first case, it was used after a failed Hong's technique attempt, while in the others it was used as a first choice.
Results: All CVCs were successfully removed. The average duration of each procedure was 35 min. There were no major complications or venous damage, even according to the flebography examination.
Discussion – Conclusion: In literature different methods were evaluated for removal. Currently the most commonly used technique is endoluminal dilation, also known as Hong's Technique, recently modified by Quaretti and Galli. It is not possible to establish whether our procedure is superior to this technique but in our experience the use of a Vollmar ring has enabled us to solve the problem in a faster, easier and more cost-effective way.

P088

Transfer of technological innovations to nursing practice and contribution to the prevention of infections: The TecPrevInf project

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Introduction: Peripheral vascular catheters (PVCs) are considered as risk factors for healthcare–associated infections, however, the magnitude of problem remains nuclear[1]. Medical devices or equipments, combined with training, can promote infection prevention[2]. The TecPrevInf project aims to transfer of innovative technologies into nursing practice (e.g., ultrasound and near-infrared light for vein selection, PVCs dressings and disposable tourniquets), and identify their impact on PVC microbiological contamination.
Method: Started in October 2017, and using an action-research approach, the TecPrevInf will be developed in five main activities: i) literature review for theoretical framework; ii) two prospective observational studies, before and after the implementation of technologies to assess their impact on PVC microbiological contamination; iii) conduct discussion panels and advanced training workshops for the