



Maritime Health Trainings for Seafarers and Doctors

«Training 5-Medical equipment used on board»

ERASMUS+ KA2 - Cooperation for Innovation and the Exchange of Good Practices
KA202 - Strategic Partnerships for vocational education and training



REPUBLIC OF TURKEY
MINISTRY OF HEALTH
GENERAL DIRECTORATE OF HEALTH
FOR BORDER AND COASTAL AREAS OF TURKEY



AP&A
GROUP

Medical Equipment used on board

Introduction

✓ **Learning Objective;**

The aim of this section is to provide general knowledge for medical supplies and basic rules for managing the medicine chest.



Thermometer



Pill



First aid kit



Oxygen mask



Resuscitator



Blood pressure monitor



Compression bandage



Stretcher



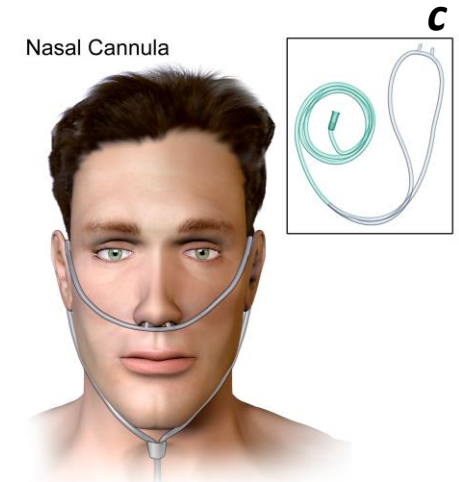
Syringe

Basic Rules for Managing the Medicine Chest

- RESPONSIBILITY
- KEEPING RECORDS
- IDENTIFICATION OF MEDICINES
- STORAGE
- EXPIRY DATE
- PREGNANCY
- UNWANTED EFFECTS AND DRUG INTERACTIONS
- DRUG ALLERGY

Fluids for Intravenous Infusion

- Parenteral Solutions (a)
- Quantities
- Flow Rate
- Oxygen
- Oxygen Cylinders (b)
- Nasal Cannula (c)



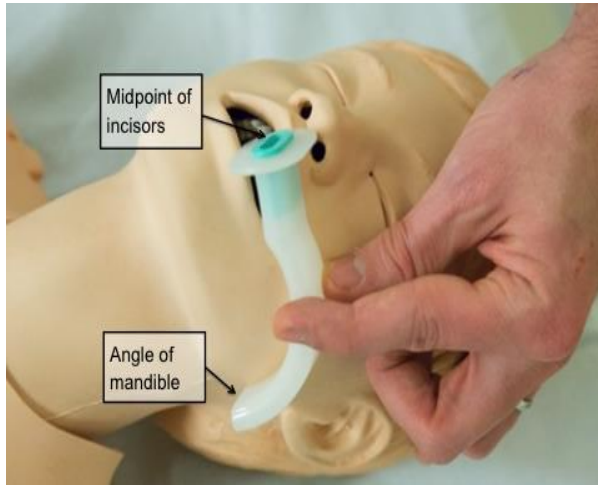
Fluids for Intravenous Infusion

- Oxygen Masks
 - Standard simple face mask (d)
 - Venturi (or high flow) mask (e)
 - Mask with reservoir bag (f)
- Quantities and Flow Rate



Equipment

- Oropharyngeal airway

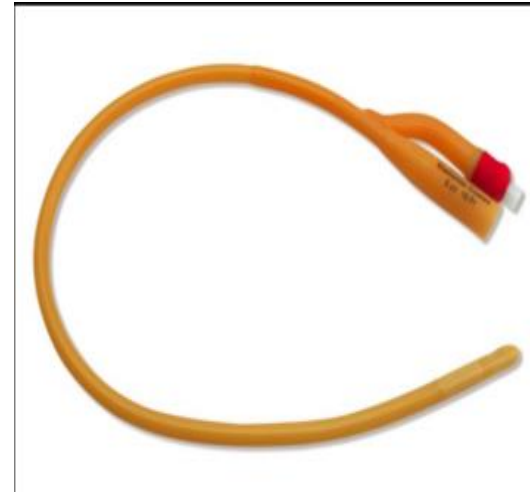


- Mechanical aspirator

*MECHANICAL ASPIRATOR
MANUAL ASPIRATOR
TO CLEAR UPPER AIRWAYS*



- Urine catheter



- Bag and mask resuscitation (ambubag)



Equipment

- Sphygmomanometer (blood pressure monitör)



- Suturing equipment



- Bandage



- Equipment for injection



- Equipment for infusion



- Malleable splints



- Standart termometr



Using Sphygmomanometer (blood pressure monitör)

- Manual, or aneroid, equipment includes; a cuff, an attached pump, a stethoscope and a gauge.
- The area to be measured should be completely bare.
- Lift up the arm to be measured to the heart level and support it from below with palms facing up.
- Place the cuff in the bare upper arm, two and a half or three centimeters above the bend of your elbow, with the connecting tubes on the upper surface of the forearm.
- Once the cuff is on, place the disk of the stethoscope facedown under the cuff, just to the inner side of upper arm.



Using Sphygmomanometer (blood pressure monitör)

- Next, place the stethoscope earpieces in ears, with the earpieces facing forward.
- Rapidly inflate the cuff to 180mmHg. Then release air from the cuff at a moderate rate (3mm/sec) by turning the knob on the pump toward you (counterclockwise) to let the air out of the cuff slowly.
- Listen with the stethoscope and simultaneously observe the dial or mercury gauge.
- The first knocking sound is the subject's systolic pressure. Continue releasing the air out of the cuff at the same rate.
- Mean while, you can still hear voices. When the knocking sound disappears, that is the diastolic pressure.
- After that, release the air in the cuff wholly and quickly.

List of Recommended Medicines and Equipment

International Medical Guide for Ships

Equipment list

	Category	Recommended item	Quantity per 10 crew
1	RESUSCITATION EQUIPMENT		
	Appliance for the administration of oxygen	Portable oxygen set, complete, containing:	1
		1 oxygen cylinder, 2 l/200 bar	1
		1 spare oxygen cylinder, 2 l/200 bar	1
		Pressure regulating unit and flow meter with tubes such that ship's industrial oxygen can also be used	1
		3 disposable face masks of choice: including simple face mask and non-rebreathing mask	3
	Oropharyngeal airway	Guedel airway (Mayo-tube): sizes medium and large	2
	Mechanical aspirator	Manual aspirator to clear upper airways, including 2 catheters	1
	Bag and mask resuscitator	Ambubag (or equivalent); supplied with large, medium and small masks	1
	Cannula for mouth-to-mouth resuscitation	Brook Airway, Lifeway, pocket face mask or equivalent	1

Medicines list

Generic name	Acetylsalicylic acid
Also known as	<ul style="list-style-type: none"> Aspirin®, Aspro®
Dosage form, strength	<ul style="list-style-type: none"> tablet 300 mg
Indications (on board ship)	<ul style="list-style-type: none"> high dose (600–900 mg): to reduce pain, fever, inflammation low dose (100–150 mg) to inhibit formation of blood clots in angina pectoris, myocardial infarction, stroke
Contraindications	<ul style="list-style-type: none"> peptic ulcer, history of gastrointestinal bleeding, haemophilia, fever in patients under 18, trauma
Consult doctor before using	<ul style="list-style-type: none"> no
Adult dosage	<ul style="list-style-type: none"> for pain and inflammation: 2–3 tablets every 4–6 hours for thrombosis: half a tablet daily
Unwanted effects	<ul style="list-style-type: none"> indigestion gastric bleeding increased bleeding during surgery
Remarks	<ul style="list-style-type: none"> to be used with caution in cardiac failure not to be used if past use has exacerbated asthma not to be used if surgery may be required within 7 days

References



[1] World Health Organization. International medical guide for ships. 3rd Ed. Geneva: World Health Organization, 2007.

[2] Perry, A. G., Potter, P. A., & Ostendorf, W. R. (2014). Clinical skills and nursing techniques (8th ed.). St Louis, MO: Elsevier-Mosby.