

INFANT RESUSCITATION CABINET

INSTRUCTIONS FOR USE



CE0086

INDEX

<u>Section</u>	<u>Page</u>
Definitions and Symbols	3
Definitions	
Symbols	
Introduction	4
Overview	
Resuscitation Cabinet	5
Wall Mounted Radiant Warmer	6
Using The Radiant Warmer	7
Alarm Monitoring	
Low Suction Controller	8
Vacuum Source Connector	
Inlet Connection and Filter	
Vacuum Gauge	
Safety Valve	
Setting Suction Levels: Therapy Equipment	9
Setting Suction Levels: Oxyliure	
Suction Receiving Equipment	10
Instructions for Use; VacSax System	
Apgar Timer	11
Function of the Keys	
Tom Thumb Infant Resuscitator	12
Low-Flow Air/Oxygen Blender	13
Equipment Layout and Interconnections	14
Pre-use Checks	15
Calibrating the Oxygen Analyser	
Consumables and Parts List	17
Parts	
Consumables required for routine daily operation	18
Consumables required periodically and during service	
Operator and Service Manuals	
Servicing	19
Routinely replaced parts	
Service Sheet	20
Apgar Timer Service Sheet	22

Cleaning	23
Clean as per MAC Manual “Part 2; Cleaning (manual) – non-immersion”	
Cleaning Guidelines	
Equipment Required	24
Procedure	
Monitoring and Control	25
Safety Precautions	
Items that can be Steam Sterilized at 121° C as per HTM 2010, Part 3	
Items Intended for Single Patient Use Only	
Warranty	26
Company Details	26
Appendices	

Definitions and Symbols

Definitions

- Note:** The remark “Note” is used in the text to indicate procedures or conditions, which might otherwise be overlooked or incorrectly understood. A note may also be used to clarify apparently contradictory or confusing situations.
- Caution:** The remark “Caution” is used to draw attention to a procedure, which must be followed exactly in order to avoid potentially damaging the equipment.
- Warning:** The remark “Warning” is used in the text to draw attention to dangerous situations in connection with the operation, cleaning or maintenance of the equipment if there is a possibility of injury or danger of death to the operator or patient.

Symbols



This symbol is used throughout this document in conjunction with the advisory declarations detailed above. Its primary function is to draw the reader's attention to the accompanying remark, which contains important information.



This symbol is used throughout this document. Its primary meaning is “Consult accompanying documentation” and refers to the individual manuals or documents for the items of equipment that are supplied with the Viamed Infant Resuscitation Cabinet.

These individual manuals are included as appendices to this manual.

INTRODUCTION

This document contains the instructions for the operation, cleaning and basic maintenance of the wall mounted Viamed Infant Resuscitation Cabinet.

Viamed is not liable for the proper functioning of any part of this system if it is not operated according to the instructions, if the maintenance recommendations in this manual are not followed, or if repairs are carried out using non-approved components.

Only qualified personnel should carry out servicing of this equipment. Maintenance documents can be obtained through your local distributor or direct from Viamed.

Servicing personnel must be aware of the potential clinical implications of incorrectly serviced equipment.

The personnel who work with this equipment should read this manual carefully and should fully understand all instructions contained therein. The manual should be kept so that it can be easily inspected; it is advisable to store it in an easily accessible place.

If any function or part of this manual is not clear, please contact Viamed or your distributor in order to obtain further information or clarification.

Overview

The Viamed Infant Resuscitation Cabinet contains a carefully selected group of products; each main item can be purchased as a single item for use individually.

Viamed have combined these devices into one product in an arrangement ideally suited to Maternity and Neonatal Intensive Care environments.

Devices forming component parts of the Resuscitation Cabinet:

- Cabinet with drop down door, integral bed and mattress
- Wall-mounted Ceratherm 600-3 radiant warmer
- Tom Thumb infant resuscitation unit
- Low suction controller
- Suction receiving jar
- Digital Apgar timer
- Storage bins
- Air/oxygen blender (optional)

The Tom Thumb infant resuscitation unit delivers medical oxygen; if blended gas mixes are required an optional air/oxygen blender and oxygen analyser are available.

All the components carry the correct and relevant CE marking.



CAUTION

Before operating the resuscitation cabinet system, please refer to the individual instruction manuals for the component devices, which are attached as appendices to this manual.

RESUSCITATION CABINET



Infant Resuscitation Cabinet Complete With Air / Oxygen Blender (Optional)

The cabinet has been designed to conceal the internal equipment when closed and provide easy access when open.

The cabinet body is finished with a hardwearing, anti-microbial coating.

The drop down platform has an integral bed, on which the mattress is placed. Additional bedding material may be placed on the mattress but care should be taken to ensure that this does not become trapped in the space between the platform and the cabinet when raising the platform.

Excessive weight should not be applied to the drop down platform. The maximum loading, including the pressure applied by the operator(s), should not exceed 25 Kg in total.

Whilst in use, the patient should be under close observation at all times.

When closing the cabinet, ensure that there are no obstructions; the cabinet should close easily and without significant force. Once the door is in the upright position, turn the catches to secure it in the closed position.



CAUTION

The door should not present resistance or need to be held closed in order to secure the catches.

Securing the catches whilst forcing the door closed may cause damage to the catches: damage of this type is not covered by the warranty.

WALL MOUNTED RADIANT WARMER



Radiant Warmer with Double-Hinged Arm

The Ceratherm 600-3 radiant warmer is mounted on a double-hinged arm, allowing the unit to be stowed away when not in use and moved into position over the resuscitation bed when required.

The radiant warmer utilizes a ceramic heating element that has very good radiation properties and generates invisible infrared radiation of around 3 μm . This radiation spectrum is absorbed very effectively by the skin and causes no harm to the patient's eyes. Do not touch the heating element at any time as this poses the risk of burns. Additionally, touching the element, even when cold, can adversely affect the performance of the element.

The radiant warmer should only be moved using the side handles, which will remain cool to the touch, even when the device is in use.

The radiant warmer has four programmable heat output levels, which can be selected directly by pressing the buttons [heat level 1-4]. The default settings for the heat levels are 20, 50, 75 and 98%.

For normal use in a delivery room environment, levels 3 or 4 should be used, depending upon the ambient temperature and the requirements of the patient.

Providing the distance between the surface on which the patient lies and the lower edge of the radiant warmer is not less than 80cm, Level 4 will not cause harm to the patient, even with prolonged use.

The Ceratherm 600-3 is fitted with a modern LED lamp. This cutting-edge light source has a lower energy consumption and higher service life than other lights. The LED lamp offers 2 brightness levels to illuminate the patient area.

Using The Radiant Warmer



CAUTION

Before operating the radiant warmer, please refer to the complete instruction manual, attached as an appendix to this manual and observe all safety precautions contained therein.

Prior to introducing a patient to the Resuscitation Cabinet, the radiant warmer can be used to pre-warm the patient surface.

The only parts of the radiant warmer that the operator needs to touch in order to operate the device are the side handles on the head unit and the control panel. Using the side handles, manoeuvre the warmer into position over the bed on the drop down platform of the resuscitation cabinet.

Turn on the radiant warmer and set the required power setting as per the instructions contained in the radiant warmer instruction manual.

After use, allow the radiant warmer to cool before manoeuvring the head unit into its stowed position: sideways and as close to the wall as the mounting arm will allow.

Handle the warmer with care when repositioning; the ceramic heating element is fragile and could be damaged by shock or impact.



WARNING!

The radiant warmer gets hot whilst in use.
Do not obstruct the upper ventilation grille.
Use only the side handles, which remain cool, to reposition the unit.

Alarm Monitoring

If the unit has been set to a heat output above level 1 for 15 minutes, a reminder alarm is activated. The alarm signal is both acoustic (buzzer sounds in five short intervals) and visual (alarm LED flashes red).

If the alarm confirmation button is pressed within 8 seconds of the alarm beginning, the alarm is deactivated for the next 15 minutes and the heater head continues operation at the previous heat output. If no alarm confirmation is given within this 8-second period, heat output is reduced to 20% for safety reasons. The red alarm LED displays this status visually until the heater head is either switched off with the on/off button or the alarm is confirmed with the alarm confirmation button. The alarm is deactivated for the next 15 minutes and the heater head continues operation at the previous heat output.



NOTE

In order to comply with the requirements of EN 60601-2-21:2010, the radiant warmer is required to activate an alarm every 15 minutes when operating in manual mode. It is not possible for the operator to disable this alarm, however, the alarm monitoring function is no longer active when the device has already reverted to its safety-power level.

LOW SUCTION CONTROLLER

The Viamed Infant Resuscitation Cabinet is supplied with one of two low suction controllers, designed specifically for medical use: Oxylitre S714 or Therapy Equipment Diamond Series.



Oxylitre S714 Low Suction Controller



Therapy Equipment Diamond Low Suction Controller

Vacuum Source Connector

The suction controller is supplied with a 3m vacuum hose assembly, which terminates in a British Standard (BS5682) probe. The device is intended for connection to a wall vacuum outlet.

Inlet Connection and Filter

The inlet connection forms an integral part of a detachable filter cartridge designed to prevent the ingress of fluids into the controller and the pipeline system. The filter should be replaced annually or if it becomes discoloured or wetted for any reason. Please see individual instructions for the model of suction controller in use in the appendices of this manual.

Vacuum Gauge

The controller is fitted with an easy to read, dual scale colour coded gauge.

Model	Suction level
Oxylitre S714 Low Suction Controller	0 to -200 mmHg (0 to -25kPa)
Therapy Equipment Diamond Low Suction Controller	0 to -150 mmHg (0 to -20kPa)

Setting Suction Levels: Therapy Equipment



CAUTION

Before operating the Therapy Equipment Diamond low suction controller, please refer to the complete instruction manual, attached as an appendix to this manual and observe all safety precautions contained therein.

To increase the level of suction, rotate the control knob on the top of the suction controller in a clockwise direction.

To decrease the level of suction, rotate the control knob on the top of the suction controller in an anti-clockwise direction.

The Therapy Equipment Diamond low suction controller has a separate ON/OFF control in the form of a 'flag' lever on the right hand side of the device.

To activate suction, move the lever to the vertically downward position, the word 'ON' is displayed on the flag. To turn the suction off, move the lever to the vertically upright position, the word 'OFF' is displayed on the flag.



WARNING

The suction level on the Therapy Equipment Diamond low suction controller will remain set at the level last used.

The suction level must be set before each use to a level determined by guidelines within the customer's own organisation.

Setting Suction Levels: Oxylitre



CAUTION

Before operating the Oxylitre low suction controller, please refer to the complete instruction manual, attached as an appendix to this manual and observe all safety precautions contained therein.

To increase the level of suction, rotate the control knob on the top of the suction controller in an anti-clockwise direction.

To decrease the level of suction, rotate the control knob on the top of the suction controller in a clockwise direction.

The Oxylitre S714 low suction controller does not have a separate ON/OFF control: to turn the suction off, decrease the suction level to the minimum setting.



WARNING

The suction level must be set before each use to a level determined by guidelines within the customer's own organisation.

SUCTION RECEIVING EQUIPMENT

The Viamed Infant Resuscitation Cabinet is supplied with the VacSax Advance suction receiving system as standard, comprising of a reusable suction receiving canister and a disposable liner.



VacSax Advance Suction Receiving System

Viamed do not supply suction catheters, however, the system is designed for use with standard 10mm suction tubing compatible with a wide range of commonly used suction catheters.

Whichever receiving system is used, ensure that the suction tubing and catheter is replaced after each use.



CAUTION

Before operating the VacSax Advance suction receiving system, please refer to the complete instruction manual, attached as an appendix to this manual and observe all safety precautions contained therein.

The VacSax Advance suction receiving liner is single patient use and should be disposed of as per the instructions contained in the device's individual user manual contained in the appendices of this manual.

The VacSax advance suction receiving canister and the tapered vacuum port connector are reusable and can be cleaned in accordance with the guidelines in the MAC Manual "Part 2; Cleaning (manual) - non-immersion"; see instructions later in this document.

As the VacSax Advance suction receiving liner contains an integral filter, it is not necessary to replace the tapered vacuum port connector and the suction tubing that connects it to the suction controller unless the tubing becomes discoloured or wetted, otherwise, these items should be replaced annually.

APGAR TIMER

The digital Apgar timer is a battery-powered digital timer with preset audible timing indications at 1, 5 and 10-minute intervals.

The timer has a large, clear LCD display and is operated using the keys on the front of the instrument.






Viamed Digital Apgar Timer



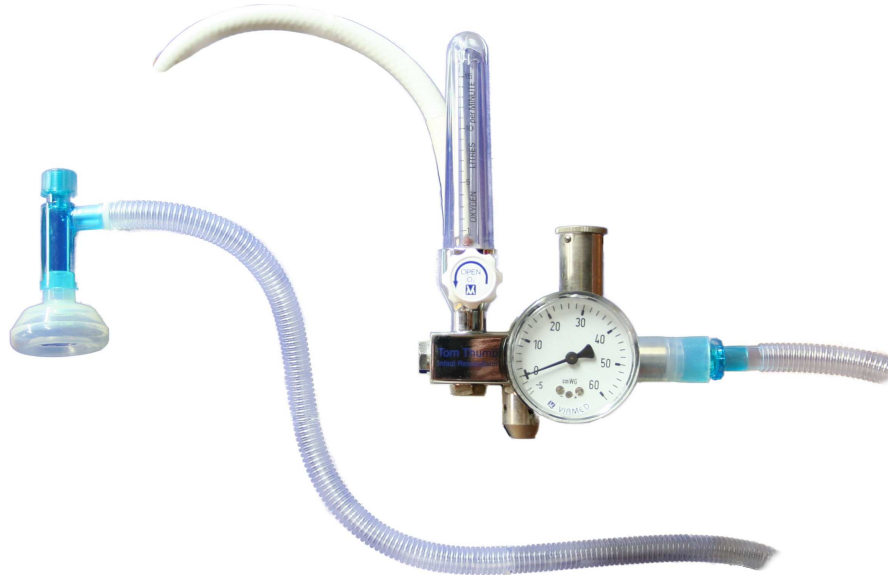
CAUTION

Before operating the Viamed Digital Apgar Timer, please refer to the complete instruction manual, attached as an appendix to this manual and observe all safety precautions contained therein.

The Functions of the Keys

Key	Function
 START	<ul style="list-style-type: none"> Starts counting from 00:00. Returns to <i>Counting Mode</i> whilst in <i>Freeze Mode</i>.
 FREEZE/ UNFREEZE	<ul style="list-style-type: none"> Enters and exits <i>Freeze Mode</i>. Display 'freezes' whilst the actual elapsed time continues counting, but is not displayed. Exiting <i>Freeze Mode</i> returns to <i>Counting Mode</i>, resuming from the ongoing total elapsed time.
 RESET	<ul style="list-style-type: none"> Resets counter, returning timer to <i>Standby Mode</i>.

TOM THUMB INFANT RESUSCITATOR



Viamed Tom Thumb Infant Resuscitator

The Tom Thumb Infant Resuscitator is supplied in one of two variants: the TT490-15, which has a 3m oxygen hose terminated with a BS probe, or the TT480, which is designed to be connected to an existing flowmeter or air/oxygen blender via low-pressure tubing.

The Tom Thumb allows the delivery of resuscitation gases at controlled flow and pressure. A flowmeter is used to control the flow rate of gas and the adjustable pressure relief valve is used to set the maximum pressure delivered to the patient during resuscitation.

The Tom Thumb incorporates a secondary, non-adjustable precision blow-off valve for added safety.



CAUTION

Before operating the Tom Thumb Infant Resuscitator, please refer to the complete instruction manual, attached as an appendix to this manual and observe all safety precautions contained therein.

For ease of access and referral, a compact, laminated copy of the Tom Thumb instruction manual is attached to the outside of the resuscitation cabinet. Additional copies can be requested from Viamed if required.



WARNING

Do not operate the Tom Thumb TT490-15 at flows greater than 15 Litres/min.
Do not operate the Tom Thumb TT480 at flows greater than 15 Litres/min.

LOW FLOW AIR/OXYGEN BLENDER

The Viamed Infant Resuscitation Cabinet may be used with a Bio-Med Devices model 2003 low flow air/oxygen blender, providing a model TT480 Tom Thumb is installed. The TT480 has a tapered inlet to connect via low-pressure tubing to the output flowmeter of an air/oxygen blender.

The Bio-Med Devices model 2003 air/oxygen blender is a precision proportioning device for mixing medical grade air and oxygen to any concentration from 21% to 100% oxygen at a flow-rate up to 30 L/min and delivering it to a variety of respiratory care devices.



Bio-Med Devices model 2003 Low Flow Air/Oxygen Blender



CAUTION

Before operating the Bio-Med Devices low flow air/oxygen blender, please refer to the complete instruction manual, attached as an appendix to this manual and observe all safety precautions contained therein.



Infant Resuscitation Cabinet with a Low Flow Air/Oxygen Blender and Oxygen Analyser Installed

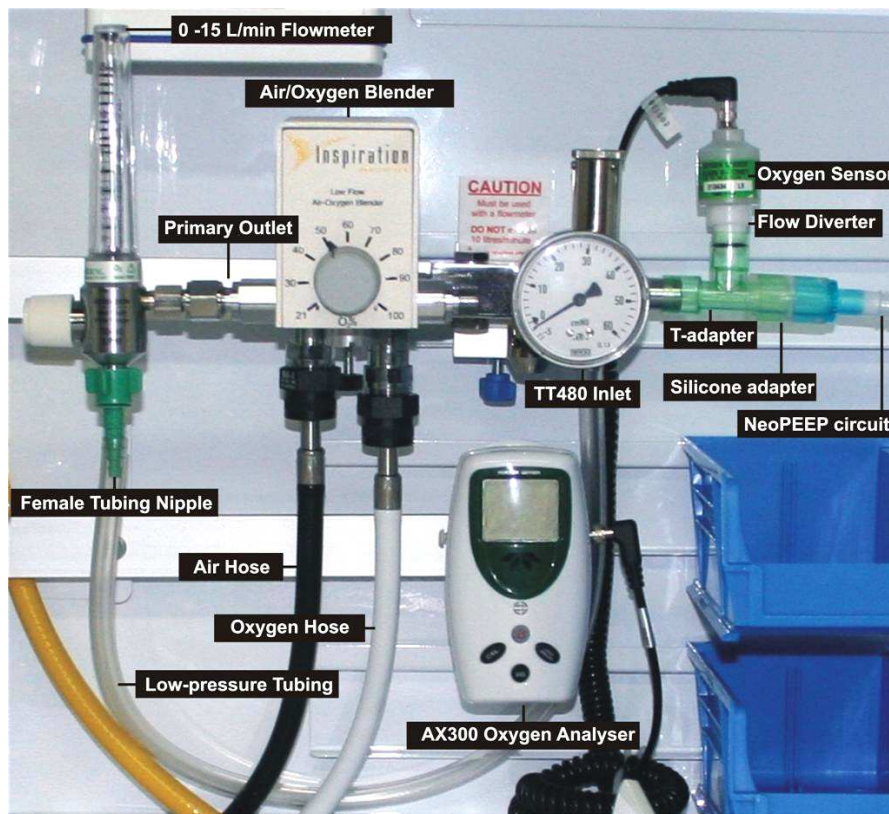
Viamed can also supply the Bio-Med Devices low flow air/oxygen blender as an upgrade option for existing resuscitation cabinet systems. If a Tom Thumb model TT490-15 is installed, which has an integral oxygen hose, this will require modification to a model TT480 Tom Thumb with a low-pressure tapered inlet.

Note: for cabinets supplied prior to 2009, the medirail sections may need to be replaced with longer lengths in order to accommodate an air/oxygen blender within the cabinet: please contact Viamed for further details.

Equipment Layout and Interconnections

The equipment should be connected as shown in the image below.

Note: an oxygen analyser can be incorporated into the cabinet system if local guidelines deem it necessary, however, one would only be supplied if specified by the customer.



Equipment Layout and Interconnections

Pre-use Checks

Before use, check that a high-pressure air hose is connected to the air fitting and a high-pressure oxygen hose is connected to the oxygen fitting on the bottom of the blender.

Check that the air and oxygen hoses are connected to a supply of air and oxygen via fixed wall outlets.



CAUTION

It is recommended that the infant resuscitation cabinet system operate from a medical gas pipeline system.

If the cabinet has been configured to operate from gas cylinders, ensure that the air and oxygen hoses are connected to the cylinders and that the cylinders are delivering the correct pressure as determined by the engineer(s) who configured the system. If in doubt, consult an engineer.

Ensure that a 0 – 15 L/min flowmeter is connected to the primary outlet of the blender, which on the Bio-Med Devices model 2003 is the outlet on the left of the device when looking from the front.

Ensure that a flowmeter female tubing nipple is connected to the blender flowmeter, and that this is in turn connected using low-pressure tubing to the Tom Thumb infant resuscitator.

If an oxygen analyser is to be used, ensure that a paediatric T-adapter is connected to the outlet of the Tom Thumb.

Ensure that a NeoPEEP patient circuit is connected to the outlet of the Tom Thumb (or paediatric T-adapter if present) using a 15mm I.D. to 15mm I.D. silicone adapter.

Before using the blender to deliver gas to a patient, set the control on the front of the blender to the desired oxygen concentration. If required, a calibrated oxygen analyser can be used to check the accuracy of the patient gas.

Calibrating the Oxygen Analyser

Viamed supply the Teledyne AX300 oxygen analyser as an option, which can be mounted inside the resuscitation cabinet.

Note: for cabinets supplied prior to 2009, the middle and lower medirail sections may require replacing with longer lengths in order to accommodate a blender and oxygen analyser: contact Viamed for further details.



CAUTION

If using an oxygen analyser, please consult the Operator's Manual for that device prior to use.

The oxygen sensor is connected via a flow diverter into the paediatric T-adapter, the T-adapter is connected to the outlet of the Tom Thumb, and the patient circuit is connected to the T-adapter.



Oxygen Sensor Connected to T-Adapter via a Flow Diverter

Remove the oxygen sensor from the T-adapter by pulling it straight out of the port.

Unscrew the flow diverter to expose the sensor to air.

Calibrate the oxygen analyser as detailed in the operator's manual for that device.

Once the calibration has been performed and the analyser is displaying an air reading, reconnect the flow diverter and insert the sensor into the T-piece.

To check the accuracy of the patient gas delivered by the blender, set a flow by adjusting the flowmeter on the blender. Set the control on the front of the blender to the desired oxygen concentration and verify that the reading on the oxygen analyser corresponds to the concentration that has been set.



NOTE

The accuracy of the blender is $\pm 3\%$ of full scale
When changing oxygen concentration, wait sixty seconds for the gas mixture to stabilize before checking it against the analyser.



WARNING

Determining the flow rates, Peak Inflation Pressure (PIP), Positive End-Expiratory Pressure (PEEP) and oxygen concentration for resuscitation are clinical decisions: follow your own organization's protocols and, if in any doubt, consult your Key Trainer or a relevant qualified person.

CONSUMABLES AND PARTS LIST

Note: the Viamed resuscitation cabinet is available in different configurations, the parts list contains equipment from all variants; care must be taken when re-ordering replacement parts. If in doubt, please contact Viamed to determine the correct item.

For parts not listed, such as spare parts required to effect repairs, please contact Viamed.

Parts	
Part no.	Description
0310002	Complete resuscitation cabinet including all parts
0310302	Wall mounted radiant warmer – Ceratherm 600-3
0330120	Element for radiant warmer – 600W ceramic
0330124	LED light for Ceratherm 600-3 radiant warmer
0330105	Cabinet body
0332100	Resuscitation cabinet door catch
0320021	Resuscitation bed, 35cm (14") wide
0320043	Mattress, 35cm (14") wide
0310035	Low suction controller (Oxylitre S714)
0330040	Suction hose assembly, 3m (Oxylitre)
0310050	Low suction controller (Therapy Equipment Diamond Series 7725-3)
0330033	Suction hose assembly, 3m (Therapy Equipment)
3833-132	VacSax reusable suction canister
3833-007	VacSax tapered suction connectors, pack of 10
9910-340	VacSax disposable liners, box of 25
0320010	Universal rail clamp with 'V' for mounting VacSax suction jar
0310100	Apgar Timer (note: mounting bracket sold separately)
0320200	Mounting bracket with rail clamp for mounting Apgar timer
0310020	Size 3 storage box
0310030	Tom Thumb resuscitation unit, type TT480 without flowmeter
0310034	Tom Thumb resuscitation unit, type TT490-15-3M with flowmeter
0330218	Oxygen hose assembly for Tom Thumb TT490-15-3M, 3m
0310200	Low-flow air/oxygen blender including flowmeter, hoses and mounting bracket
0310201	Low-flow air/oxygen blender (blender only)
0320210	Flowmeter, 0 – 15 L/min for use with air/oxygen blender
0320214	Rail mount bracket for use with air/oxygen blender
0320216	NIST hose with MKIV oxygen probe, 3m, for use with air/oxygen blender
0320217	NIST hose with MKIV air probe, 3m, for use with air/oxygen blender
0330213	O-ring, thick. Each Tom Thumb uses 1, replaced during service
0330214	O-ring, thin. Each Tom Thumb uses 6, replaced during service
0120103	Paediatric T-adaptor, 15mm I.D. to 15mm O.D. with 15mm I.D. port

Note: only required if connecting an oxygen analyser into the patient circuit

Consumables required for routine daily operation	
Part no.	Description
3210011	NeoPEEP circuit with variable PEEP, single patient use (without mask) <small>The NeoPEEP circuit can be used with size 0, 0.5 or size 1 masks</small>
3210070	Single use silicone face mask, size 0
3210067	Single use silicone face mask, size 0.5
3210071	Single use silicone face mask, size 1
9910-340S	VacSax disposable liner, single unit <small>Can be purchased singly or in boxes of 25</small>
9910-340	VacSax disposable liners, box of 25
0120140	Silicone adapter for connecting NeoPEEP circuit to Tom Thumb <small>Note: only required if the previous adapter has been disposed of. As an alternative, disposable adapters can be used.</small>
0120141	Disposable adapter for connecting NeoPEEP circuit to Tom Thumb

Consumables required periodically and during service	
0310104	Filter for Oxylitre S714 low suction controller, single unit <small>1 filter required per system. Can be purchased singly or in boxes of 30</small>
0310105	Filters for Oxylitre S714 low suction controller, box of 30
0310111	Filter for Therapy Equipment 7725 low suction controller, single unit <small>1 filter required per system. Can be purchased singly or in boxes of 10</small>
0310112	Filters for Therapy Equipment 7725 low suction controller, box of 10
0330035	Suction clear tubing, 1m <small>Approximately 50cm of tubing is required per system</small>
0330213	O-ring, thick. <small>Each Tom Thumb requires 1, which is replaced during service</small>
0330214	O-ring, thin. <small>Each Tom Thumb requires 6, which are replaced during service</small>
0330040	Vacuum hose assembly, 3m (Oxylitre) <small>Hose should be replaced at least every 4 years, regardless of the condition of the hose</small>
0330033	Vacuum hose assembly, 3m (Therapy Equipment) <small>Hose should be replaced at least every 4 years, regardless of the condition of the hose</small>
0332000	Annual service kit for model 2003 blender <small>1 service kit required per blender</small>
0332001	Overhaul kit for model 2003 blender <small>Overhaul recommended every 4 years. Overhaul kit includes an annual service kit</small>

Operator and Service Manuals	
Part no.	Description
0391045	Resuscitation cabinet operator's manual
0391050	Resuscitation cabinet installation manual
0390007	Tom Thumb TT490-15 instructions for use
0390006	Tom Thumb TT480 instructions for use
0390022	TT480 service manual
0390023	TT490-15 service manual
0390021	Tom Thumb valves service manual (common to all Tom Thumb variants)
2122	Bio-Med Devices Air Oxygen blender operator's manual
0392000	Digital Apgar Timer operator's manual
0391021	Ceratherm 600-3 operator's manual
0391022	Ceratherm 600-3 service manual
0391023	Ceratherm 600-3 supporting documents on CD

SERVICING

It is recommended that the resuscitation cabinets, its internal components and the radiant warmer be serviced annually. Service contracts are available; please contact Viamed for further information.

Service training courses are available from Viamed and service training courses for the air/oxygen blender are available from Inspiration Healthcare; please contact Viamed for further information.

Service the individual items of equipment using their respective Service or Operator's manuals, copies of which are available from Viamed.

For versions of the Tom Thumb that have an integral flowmeter and hose, Viamed recommends that the hose is inspected for wear or damage every 3 months and replaced every 4 years regardless of condition of the hose.

If the Viamed Infant Resuscitation Cabinet has been supplied with a Therapy Equipment low suction controller, the manufacturer recommends that the vacuum hose be replaced at least every 4 years, regardless of the condition of the hose.

If the Viamed Infant Resuscitation Cabinet has been supplied with an Oxylitre low suction controller, the manufacturer recommends that the vacuum hose be replaced at least every 4 years, regardless of the condition of the hose.

If the Viamed Infant Resuscitation Cabinet has been supplied with an air/oxygen blender, the manufacturer recommends that the air and oxygen hoses be replaced at least every 4 years, regardless of the condition of the hose. Additionally, the air/oxygen blender should be subject to a complete overhaul every 4 years, please contact Viamed or Inspiration Healthcare for further details on how to achieve this.

The following table details the parts that will be required for service, along with the frequency with which they should be replaced. Which parts are required will depend upon the specific configuration of the resuscitation cabinet in question.

Routinely replaced parts		
Part no.	Description	Replacement frequency in years
0330213	O-ring, thick. Each Tom Thumb uses 1, replaced during service	1
0330214	O-ring, thin. Each Tom Thumb uses 6, replaced during service	1
3833-007	VacSax tapered suction connectors, pack of 10	1
0310104	Filter for Oxylitre low suction controller, single unit	1
0310109	Filter for Therapy Equipment low suction controller, single unit	1
0330035	Suction clear tubing, 1m (approx 50cm per system)	1
0330218	Oxygen hose assembly for Tom Thumb, 3m (note: only for TT490-15)	4
0330040	Suction hose assembly, 3m (Oxylitre)	4
0330033	Suction hose assembly, 3m (Therapy Equipment)	4
0320216	NIST hose with MKIV oxygen probe, 3m, for air/oxygen blender if installed	4
0320217	NIST hose with MKIV air probe, 3m, for air/oxygen blender if installed	4
0332000	Annual service kit for model 2003 blender	1
0332001	Overhaul kit for model 2003 blender – includes annual service kit	4

Document ref: 0391055	
Version: 1.4	
Viamed Infant Resuscitation Cabinet Service Sheet	
Hospital / Organisation:	
Location (department, room number):	
Engineer (print):	
Service Date:	
Action	Notes OK
Cabinet Body – Serial number:	
Check for overall signs of damage Comments:	<input type="checkbox"/>
Check door catches for functionality and signs of damage Comments:	<input type="checkbox"/>
Check integrity of welds on the door hinges Comments:	<input type="checkbox"/>
Check hinges for damage or deformation Comments:	<input type="checkbox"/>
Check the restraining bars for damage or deformation Comments:	<input type="checkbox"/>
Check the cabinet is securely fixed to wall Comments:	<input type="checkbox"/>
Check medirails and tighten any loose rails Comments:	<input type="checkbox"/>
Check grommets on the hose inlets are in place and intact Comments:	<input type="checkbox"/>
Check the bumper stops that prevent door banging during closing (note: not all cabinets require these) Comments:	<input type="checkbox"/>
Check 'caution' sticker is in place on the platform Comments:	<input type="checkbox"/>
Check bed for damage i.e. cracks, chips Comments:	<input type="checkbox"/>
Check all the bed mounting screws are in place Comments:	<input type="checkbox"/>
Check mattress for damage i.e. tears, split seams Comments:	<input type="checkbox"/>
Tom Thumb – Serial Number:	
Follow service procedure as detailed in the Tom Thumb service manual Comments:	<input type="checkbox"/>
Check oxygen hose, if present, for wear, and replace if necessary (at least every 4 years) Hose replaced? Yes <input type="checkbox"/> No <input type="checkbox"/> Date of last hose replacement: Comments:	<input type="checkbox"/>

Action	Notes	OK
Low Suction Controller – Serial number:		
Follow service procedure as detailed in suction controller operator's or service manual Comments:		<input type="checkbox"/>
Change filter assembly Comments:		<input type="checkbox"/>
Check vacuum hose for wear, and replace if necessary (at least every 4 years) Hose replaced? Yes <input type="checkbox"/> No <input type="checkbox"/> Date of last hose replacement: Comments:		<input type="checkbox"/>
Check rail clamp is securely attached to suction controller Comments:		<input type="checkbox"/>
Replace suction tubing between suction controller and receiving liner Comments:		<input type="checkbox"/>
Replace tapered connector on suction tubing Comments:		<input type="checkbox"/>
Check receiving canister for damage, replace if necessary Comments:		<input type="checkbox"/>
Radiant Warmer – Serial number:		
Note: if the unit is hard wired, a PAT test may not be applicable: consult your organisation's regulations.		
Is unit hard-wired? Yes <input type="checkbox"/> No <input type="checkbox"/>		
PAT test performed? Yes <input type="checkbox"/> No <input type="checkbox"/> Pass <input type="checkbox"/> Fail <input type="checkbox"/> Comments:		
Follow service procedure as detailed in radiant warmer service manual Comments:		<input type="checkbox"/>
APGAR Timer – Serial number:		
Change batteries Comments:		<input type="checkbox"/>
Follow service procedure as detailed in Apgar timer operator's manual Comments:		<input type="checkbox"/>
Air/Oxygen blender (if present) – Serial number:		
Follow service procedure as detailed in radiant warmer service manual Comments:		<input type="checkbox"/>
General		
Check storage bins present Comments:		<input type="checkbox"/>
Tidy any trailing hoses, using tie-wraps if necessary Comments:		<input type="checkbox"/>
Clean the cabinet with suitable cleaning wipes (Viamed recommends TECcare Control) Comments:		<input type="checkbox"/>
Additional notes or comments:		

Version:		1.1
Digital Apgar Timer Service Sheet		
Hospital / Organisation:		
Location (department, room no.):		
Engineer (print):		
Service Date:		
Action	Further action required	OK
Serial number:		
Batteries replaced Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Check for overall signs of damage Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Check START button enters <i>Counting Mode</i> Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Check FREEZE button enters <i>Freeze Mode</i> Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Check FREEZE button resumes <i>Counting Mode</i> Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Re-enter <i>Freeze Mode</i> , check START button resumes <i>Counting Mode</i> Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Check RESET button enters <i>Stand-by Mode</i> Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Start a stopwatch whilst simultaneously pressing START (note: there may be a slight pause before the timer begins counting, ensure they are running in synchronisation before proceeding)		
Check single beep audible indication at 1 minute Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Check two beeps audible indication at 5 minutes Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Check three beeps audible indication at 10 minutes Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Check count is synchronized with the stopwatch at 10 minutes, ± 1 sec Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Check mounting clamp and bracket are securely fastened Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Clean unit as detailed in the Operator's Manual Comments:	<input type="checkbox"/>	<input type="checkbox"/>
Additional notes or comments:		

CLEANING

Cleaning guidelines in this manual complement those given in the Medical Devices Agency document “Sterilization, disinfection and cleaning of medical equipment: guidance on decontamination from the Microbiology Advisory Committee to Department of Health Medical Devices Agency”. This document is more commonly known as the ‘MAC Manual’, and is referred to as such in this document for convenience.

With reference to the MAC Manual, “Introduction to Part 1 - Table 1: Classification of infection risk associated with the decontamination of medical devices”; many of the items of equipment comprising the Viamed Wall-Mounted Resuscitation Cabinet system are classified as low risk, due to being “In contact with healthy skin, or not in contact with the patient”.

The recommended decontamination method for low risk items is to clean in accordance with the guidelines in the MAC Manual “Part 2; Cleaning (manual) - non-immersion”.

Clean as per MAC Manual “Part 2; Cleaning (manual) – non-immersion”

- Radiant warmer
- Cabinet body
- Mounting rails
- Storage bins
- Integral bed
- Mattress
- Tom Thumb infant resuscitator
- Low suction controller
- VacSax suction receiving canister (can also be steam sterilized if required)
- Apgar timer

Cleaning Guidelines

The items listed above are low risk and not intended to be disinfected or sterilized, but where an alcohol wipe is used, this may have a disinfecting effect. After manual cleaning, an alcohol wipe containing 70% ethanol can be used over all external surfaces, observe safety precautions detailed later in this document.

It is recommended that a neutral detergent solution be used in accordance with the manufacturer’s guidelines. For maximum efficacy, Viamed recommends the use of TECcare Control: a high-level broad-spectrum disinfectant cleaner with prolonged antimicrobial protective effect.

Sodium hypochlorite solutions are not recommended due to their potential corrosive effect on some metals.

The equipment within the cabinet system is mounted on standard mounting rails. To remove the equipment, loosen the rail clamps by rotating the securing bolts until the equipment can be lifted free of the rail.

It is recommended that the bed be cleaned in-situ. Should it be necessary, the bed can be removed by removing the 6 screws holding it in place. Care should be taken when re-attaching the bed not to over-tighten the screws.

NOTE: the following instructions detail the method of manual cleaning (non-immersion) as directed by the MAC Manual. Should these instructions contradict guidelines in place within the customer's own organization, or those of the manufacturer of the cleaning detergent, please contact your Sterile Services Department or other responsible body within your organization for advice.

Equipment Required

- A warm water/detergent solution at correct dilution.
- A clean, disposable, absorbent, non-shedding cloth for application of detergent solution.
- A clean, disposable, absorbent, non-shedding cloth or mechanic drying facility (e.g. drying cabinet or industrial hot air dryer).
- An appropriate chemical neutraliser, first aid kit and eyewash bottle, in case of splashing with detergent.

Procedure

- If the item is electrical, ensure that it is disconnected from the mains supply before commencing the cleaning procedure.
- Wearing protective clothing, immerse the cleaning cloth in the detergent solution and wring thoroughly.
- Commencing with the upper surface of the item, wipe thoroughly ensuring that detergent solution does not enter electrical components.
- Periodically rinse the cloth in clean water and repeat the above steps.
- Surfaces should be carefully hand-dried using a cloth or industrial hot air dryer or placed into a drying cabinet.

Note: Non-immersion, manual cleaning is not a disinfection process, but where an alcohol wipe is used to dry surfaces, this may have a disinfecting effect.

- Safely dispose of cleaning materials and alcohol wipes, if used.

Monitoring and Control

Owing to the lack of control methods available to the user to test the efficiency of non-immersion cleaning, the user should be aware of the factors that may alter the efficiency of the method:

- staff training
- physical application
- nature of soil
- accessibility of cleaner to item/part of equipment
- detergent concentration

Safety Precautions

- Always wear protective waterproof clothing, robust gloves and eye protection if splashing is likely to occur.
- After removing protective clothing on completion of task, thoroughly wash and dry hands.
- Avoid splashing.
- Precautions should be taken when using alcohol, as it is flammable.
- The 'pooling' of alcohol on equipment should be avoided and alcohol evaporation ensured, if necessary by forced air drying. Care should also be taken to ensure that alcohol does not enter the item e.g. via ventilation slots.

Items that can be Steam Sterilized at 121° C as per HTM 2010, Part 3

- VacSax suction receiving canister
- VacSax suction taper

Items Intended for Single Patient Use Only

- Breathing circuit
- Suction tubing
- VacSax suction receiving liners
- Suction catheters



WARNING

Do not attempt to reprocess items intended for single patient use.

WARRANTY

Viamed guarantees all parts of the Viamed wall mounted Infant Resuscitation Cabinet System for a period of 12 months from the date of purchase.

Some components of this system, for example low suction controllers, may be covered by a manufacturer's warranty in addition to the standard warranty: please contact Viamed for further details.

The best materials and workmanship have been employed throughout every stage of manufacture and every part is thoroughly tested before dispatch.

This warranty covers defects in materials and manufacture but excludes damage caused by accident, misuse or neglect.

Should a component develop a defect within the warranty period, it will be repaired or replaced at Viamed's discretion.

In the event of warranty claims or queries regarding this product when purchased outside the UK, please contact your local distributor.

COMPANY DETAILS

All products are CE marked to the requirements of MDD 93/42 EEC and are supplied in accordance with our quality system accreditations:
BS EN ISO 9001:2008 and ISO 13485:2003.

Contact details:

Viamed Ltd.
15 Station Road
Cross Hills
Keighley
West Yorkshire
BD20 7DT
United Kingdom

Tel: +44 (0)1535 634542
Fax: +44 (0)1535 635582

Email: info@viamed.co.uk
Web: www.viamed.co.uk