

## TECHNICAL SPECIFICATIONS



### POWER

Control Units:	Power Input	: 220 V AC - 110 V AC 50 HZ / 60 HZ
	W-500D	: 350 Watt 24 Volt AC
	W-300	: 350 Watt 24 Volt AC
	W-150	: 150 Watt 24 Volt DC
	W-150T(Large)	: 270 Watt 24 Volt DC (for Adult patient)
	W-150T(Small)	: 90 Watt 12 Volt DC (for Neonate patient)

### TEMPERATURE OUTPUT RANGE

30° C to 40° C (90° F to 104° F) in steps of 0.1° C (Temperature settings can be adjusted upon request).  
High Temperature Safety Cut Off Point at 42° C (109° F)

### DIMENSIONS TYPE SIZE WEIGHT DESCRIPTION

DIMENSIONS	TYPE	SIZE	WEIGHT	DESCRIPTION
Control Units:	W-500D	187x282x87 mm	5,5 kg.	-
	W-300	187x282x87 mm	5,6 kg.	-
	W-150	72x104x26 mm	0,8 kg.	With Adaptor
	W-150T (Large)	187x282x87 mm	4,25 kg.	With Battery
	W-150T(Small)	187x168x87 mm	2,0 kg.	With Battery
Warming Mattresses:	IM-190MS	190x50x3 cm (with foam)	4,0 kg.	Large Size
	IM-150 MS	150x50x3 cm (with foam)	3,3 kg.	Medium Size
	IM-120MS	120x50x3 cm (with foam)	2,25 kg.	Medium Size
	IM-80MS	80x50x3 cm	1,90 kg.	Small Size
	IM-190M	190x50 cm	2,75 kg.	Large Size
	IM-120M	120x50 cm	1,75 kg.	Medium Size
	IM-80M	80x50 cm	1,25 kg.	Small Size
Blankets	IM-235B	235x130 cm	2,8 kg.	Large Size
	IM-190B	190x100 cm	2,3 kg.	Large Size
	IM-180BAS	180x45 cm	1,1 kg.	Arm-Shoulder Warming
	IM-150BAS	150x45 cm	0,85 kg.	Arm-Shoulder Warming
	IM-120B	120x80 cm	1,1 kg.	Medium Size
	IM-85 DB	85x55 cm (x2)	1,4 kg.	Small Size - Two Pieces
IM-80B	80x70 cm	0,75 kg.	Small Size	

Cable Length 3 Meters

### ALARMS

Power Alarm	: Activated if power is cut off or if the power cord is disconnected when the unit is turned on.
Ped Alarm	: Activated when the connection between the controller and the mattress is cut off.
In-Op Alarm	: Activated in case of a technical problem.
High Temperature Alarm	: For Adults and Pediatrics, 42° C is the highest temperature. When the measured temperature reaches this value, the device outputs audible and visual alarms.
High/Low Deviation	: If the temperature of the blanket goes -1,5° C below the set temperature, low deviation alarm is sounded. If the temperature goes +1,5° C over the set temperature, high deviation alarm is sounded.

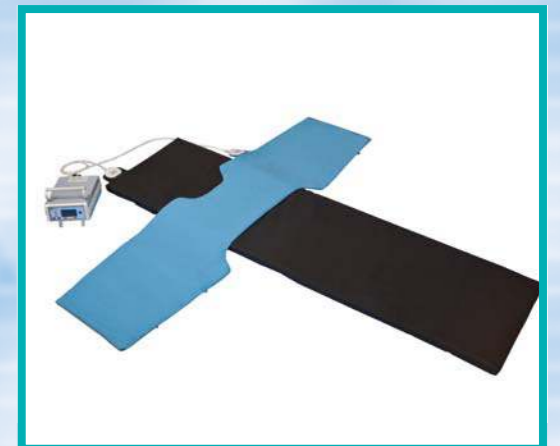
### COMPLIANCE

EN60601-1	Class IIb Type BF
EN60601-1-2	Electrical Safety Requirements for medical devices
93/42/EEC	Medical Device Directive
73/23/EEC	Low Voltage Directive
EN60601-2-35	Medical Electrical Equipment

### ENVIRONMENTAL

Ambient Temperature (Operating)	15° C - 40° C
Ambient Temperature (Storage)	-10° C - 55° C
Relative Humidity	%30 - %70

For better clinical care  
**MEDWARM**  
**PATIENT**  
**WARMING**  
**SYSTEMS**



**İSTANBUL MEDİKAL LTD.ŞTİ**

Tel:+90 216 336 27 64 Fax:+90 216 336 27 09 GSM:+90 533 472 52 00  
Address: Kuyubasi Egitim Mah. Sirinyuva Sok. No:3 Kat:1 Daire:1 Kadikoy/İSTANBUL  
info@istanbulmedical.com - sales@istanbulmedical.com - www.istanbulmedical.com



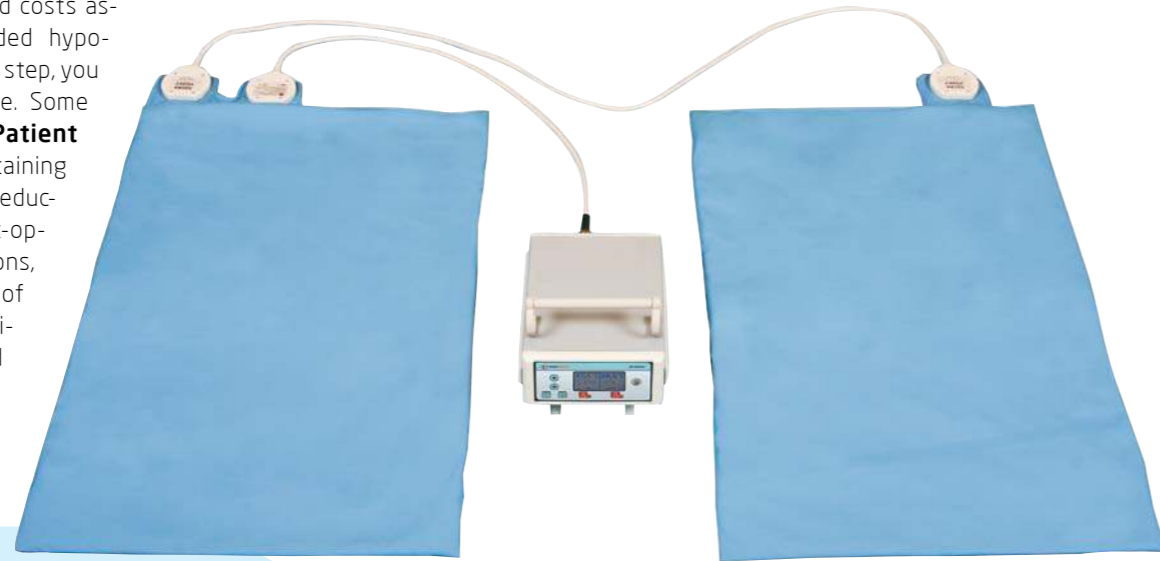
# Why should you choose MEDWARM Patient Warming Systems?

## PATIENT WARMING IS IMPORTANT!

Hypothermia is a condition in which body's core temperature drops below the required temperature for normal metabolism and body functions which is defined as 35.0° C (95.0° F). The primary causes of hypothermia include; administration of anesthetic drugs and cold temperatures maintained in most operating rooms. The good news is that preventing hypothermia can be simple, effective and affordable. The implementation of a patient warming system can benefit both patients and clinical staff to overcome complications of hypothermia.

## BENEFITS OF PATIENT WARMING

Maintaining normal body temperature has been shown in more than 100 scientific papers to reduce the risk of complications and costs associated with unintended hypothermia. With one simple step, you can make a big difference. Some of the benefits of **Patient Warming** and maintaining normothermia include; reduction in the rate of post-operative wound infections, decreased likelihood of post-operative myocardial infarction, shortened hospital length of stay, and lower mortality rates.



Double Blanket

## MEDWARM PATIENT WARMING TECHNOLOGY

Our patient warming systems use the latest developments in **carbon fiber materials** and microprocessors to avoid hypothermia in **operation rooms, neonatal intensive care departments** and **maternity wards** through stabilizing or raising the peripheral temperature of the patient carrying the risk of hypothermia effectively to provide a warm and comfortable environment. Our mattresses and blankets are made of carbon fiber and viscoelastic foam surrounded by a silicon layer and polyurethane coverings. These features increase the heating performance and provide extra comfort for the patient. **Carbon fibre material used in our products also allows for X-RAYS.**



W-300 Control Unit



Mattresses

## ADVANTAGES OF OUR PRODUCTS

### THE BEST HEATING PERFORMANCE

Our Patient Warming System features increase the warming performance and provide the patient a soft and comfortable environment. Materials used for heat isolation also assure that there is no energy loss during the process.

### SHORT WARMING TIMES

Our mattresses and blankets can reach **37° C within 7-10 minutes** giving us a great advantage over other products.

### COMFORTABLE AND EASY TO USE

Through the viscoelastic foam rubber used inside the warming mattresses, we prevent decubitus ulcers which may occur on patients with prolonged stay during operations or recovery. Soft and lightweight blankets can easily cover the patient and provide a comfortable warming experience.

### TRANSPORT OPTION WITH BATTERY

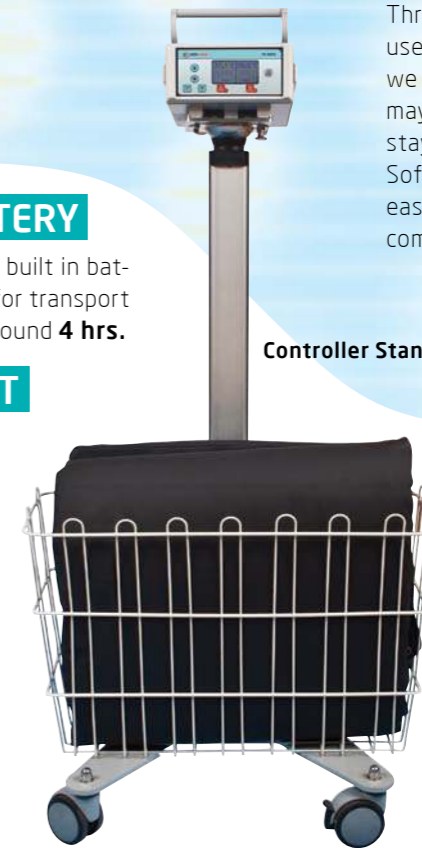
Some of the controller unit models are available with a built in battery option for transportational purposes. Battery life for transport models is around **3-4 hrs.** Full charging period is also around **4 hrs.**

### HIGH LEVEL SAFETY & LOW COST

Power source and control is managed through the controller unit which is separate from the mattresses and blankets. All our systems operate on low voltage requirements (12 Volts DC - 24 Volts AC/DC) which is cost efficient and technically safe for patients and operators. The temperature settings are managed through the membrane switches available on the controller unit and are controlled through multiple sensors. Once the temperature reaches the set value, heating process is **automatically stopped.** Current high temperature safety cut off point is set at 42° C (109° F).

### WIDE VARIETY OF PRODUCTS

Our products are available in a wide variety of sizes and dimensions to answer all our clients' clinical needs and requirements such as **ADULTS, PEDIATRIC PATIENTS and NEONATES.**



Controller Stand

### WATER PROOF & EASY TO CLEAN

All our products are completely sealed and water proofed against all liquids, and they are also easily cleanable. Disposable and multi-use covers are also made from PU (polyurethane foam) which is permeable to air and vapor and provides protection against fluids.

### SILENT AND LIGHTWEIGHT

Our control units are lightweight and work silently with digital LCD and LED displays to adjust/view set and measured temperature values.

### AFFORDABLE PRICES

All our products are very well priced and extremely affordable in comparison to other products available in the market.



W-150 Control Unit

# MEDWARM Advantages

- Short Warming Times
- Affordable Prices
- Transport Option (Battery)
- High Level Safety
- Comfortable and Easy to Use
- Silent and Lightweight



Premature Swaddling Blanket

## TECHNICAL SPECIFICATIONS

### POWER

Control Units:	Power Input	: 220 V AC - 110 V AC 50 HZ / 60 HZ
	W-150	: 90 Watt 12 Volt DC
	W-150T (S)	: 90 Watt 12 Volt DC (For Transport purposes)
	Battery Capacity	: 9600 mA

### TEMPERATURE OUTPUT RANGE

30° C to 39° C (90° F to 102° F) in steps of 0.1° C (Temperature settings can be adjusted upon request).  
High Temperature Safety Cut Off Point at 41° C (105.8° F)

DIMENSIONS	TYPE	SIZE	WEIGHT	DESCRIPTION
Control Units:	W-150	72x104x23 mm	0,8 kg.	With Adaptor With Battery
	W-150T(Small)	187x168x87 mm	2,0 kg.	
Warming Mattresses :	IM-60MS	60x35x2 cm (with foam)	1,25 kg.	Neonatal Neonatal
	IM-50 M	50x35x1 cm	0,6 kg.	
Blankets	IM-65BK	65x70 cm	1,1 kg.	Neonatal Neonatal
	IM-55BK	55x50 cm	0,9 kg.	
Cable Length	3 Meters			

### ALARMS

Power Alarm	: Activated if power is cut off or if the power cord is disconnected when the unit is turned on.
Ped Alarm	: Activated when the connection between the controller and the mattress is cut off.
In-Op Alarm	: Activated in case of a technical problem.
High Temperature Alarm	: For Neonates, 41° C is the highest temperature. When the measured temperature reaches this value, the device outputs audible and visual alarms.
High/Low Deviation	: If the temperature of the blanket goes -1,5° C below the set temperature, low deviation alarm is sounded. If the temperature goes +1,5° C over the set temperature, high deviation alarm is sounded.



İSTANBUL MEDİKAL LTD.ŞTİ

Tel:+90 216 336 27 64 Fax:+90 216 336 27 09 GSM:+90 533 472 52 00

Address: Kuyubasi Egitim Mah. Sirinyuva Sok. No:3 Kat:1 Daire:1 Kadikoy /İSTANBUL

info@istanbulmedikal.com - sales@istanbulmedikal.com - www.istanbulmedikal.com



# MEDWARM NEONATE WARMING SYSTEMS

A newborn baby can have difficulty protecting its' core body temperature as their bodies and internal organs are not yet fully developed. A newborn baby should especially be warmed up very well immediately after birth to avoid hypothermia.

The good news is that preventing neonatal hypothermia can be simple, effective and affordable. The implementation of a neonatal patient warming system can benefit both patients and clinical staff to overcome complications of hypothermia.



W-150 Control Unit  
With Premature Swaddling Blanket

## OUR NEONATAL WARMING TECHNOLOGY

Our neonatal warming systems use state of the art technology and the latest developments in carbon fiber materials and microprocessors to avoid hypothermia in neonatal intensive care departments and maternity wards. Our neonate warming systems effectively provide a warm and comfortable environment by stabilizing or raising the peripheral temperature of the neonate patient carrying the risk of hypothermia.



Baby Swaddling Blanket

## COMFORTABLE AND EASY TO USE

Our neonatal patient warming system models are; **swaddling blanket, mattress and blanket with mattress.**

Our neonatal controllers are W-150 model and W-150T (S) which is a transport model. For safety, a low voltage level is used in these devices (12 Volts).

Swaddling blanket provides a comfortable and safe warming environment for the baby through a sensitive sensor system wrapping the baby's whole body.

Transport models can easily be used during transfers from delivery rooms to maternity wards. These models also come with a **4-5 hour** battery which is a great advantage. Full charging period is also around 4 hrs.

Swaddling blanket model can be used during external hospital transfers together with transport incubators to provide better warming especially during cold weathers.

Swaddling blanket model is also suitable for usage during incubator disinfections when the baby is taken out of the incubators. The blanket can provide safe and comfortable warming during cleaning.



W-150T Small Control Unit