

Providing the most effective solutions  
for design and use of test environments  
in life science research

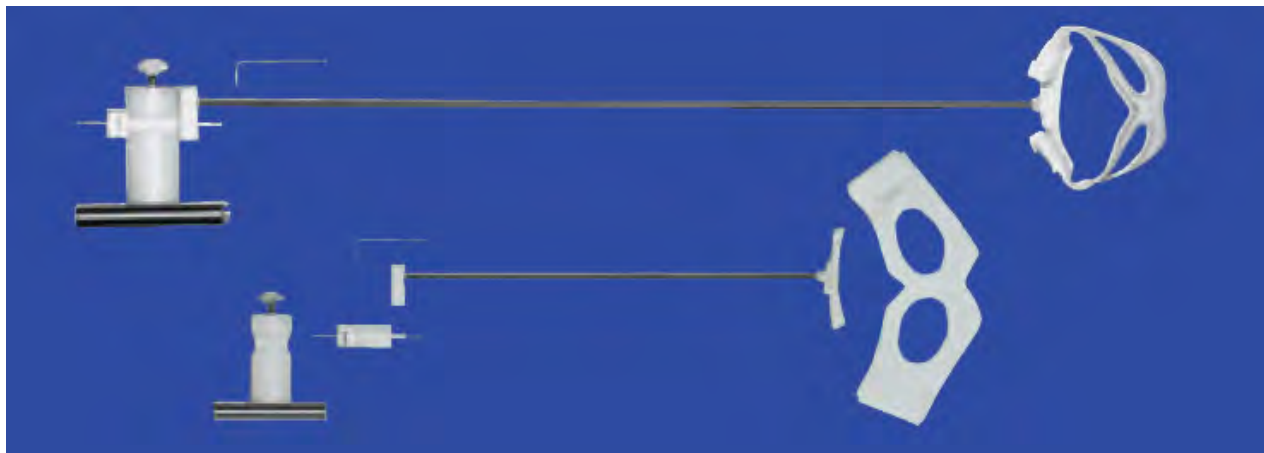
**Infusion Swivels & Jackets**

**UNO-LIFESCIENCE.COM**


# Swivels & Jackets

## Small Animal Infusion System


Completely integrated rodent infusion systems providing maximum procedural flexibility and precision. Infusion sets may be purchased complete or as individual components and are also available pre-sterilised.



### Swivel Holders

		Stainless steel and high-impact plastic construction. Available in two designs selected by the type of cage in use.	
		For Single Channel Swivel	For Double Channel swivel
<b>Clip retainer</b>	RS01	RS03	
<b>Shoe Box retainer (placed on wire lid)</b>	RS02	RS07	


### Swivels


		High Impact thermoplastic, precision stainless steel hypodermic tubing, and teflon seals. Single or double fluid channels in a range of needle sizes.					
<b>SINGLE CHANNEL</b>	18 gauge	22 gauge	20 gauge	21 gauge	23 gauge	26 gauge	27 gauge
Standard rodent swivel HIP	X	RSP1	RSP2	RSP3	RSP4	RSP5	RSP6
Rodent Swivel HIP with fixed collar for balance arm	X	RSP1C	RSP2C	RSP3C	RSP4C	RSP5C	X
Rodent Swivel HIP w/ fixed collar for balance arm and luers	X	RSP1CL	RSP2CL	RSP3CL	RSP4CL	RSP5CL	X
<b>DOUBLE CHANNEL</b>							
Rodent swivel - HIP -2 channel	X	RSPF2	RSPF1	RSPF4	RSPF3	X	X
<b>MOUSE SWIVELS</b>							
Mouse Swivels HIP	X	MSP1	X	X	MSP4	MSP5	MSP6
<b>SMALL ANIMAL CHANNEL</b>							
Guinea pig etc	BSP2	X	BSP1	X	X	X	X
Also available in Stainless Steel precision stainless steel hypodermic tubing, and teflon seals. Single or double fluid channels in a range of needle sizes.							
<b>SINGLE CHANNEL</b>	X	RSS1	RSS2	RSS3	RSS4	X	X


Add -S after the product code for sterile delivery!


## *Swivels & Jackets*


### *Small Animal Infusion System*

Swivel / tether connector		
	These provide a secure attachment between Swivels and Tethers ensuring an ease of movement through 360°.	
For Single channel swivel	RST1	
For Double channel swivel	RST3 to single tether	RST4 to double tether

Rodent Tethers			
	Manufactured from a strong but light stainless steel spring, in three standard lengths: 30cm, 46cm and 61cm for single or multiple channel use. Models available for use with either jackets, tail cuffs or harness.		
	30cm	46cm	61cm
For use with Jacket (Rat, Guinea pig)	RT12S	RT18S	RT24S
For use with Tail cuff or Harness (Rat)	RT12T	RT18T	RT24T
For use with Tail cuff with connector (Rat)	RT12EL	RT18EL	RT24EL
For use with Jacket (Mouse, Hamster)	MT12S	MT18S	MT24S
For use with Tail cuff (Mouse)	MT12T	MT18T	MT24T


Tail cuff		
	Constructed of stainless steel with self-threading tether attachment point. Used as an alternative to rodent jackets.	
	For Rat	For Mouse
	RTT1	MTT1

Harness	
	Full silicone Harnesses available for mouse and rat in various models; standard, Quick connect, complete with tethers or harness only. Please contact us for a complete summary of available models.

Butterfly Harness - MOUSE	
	A versatile new product: created from One Strap Velcro making for a simple to use mouse harness suitable for the majority of mice commonly used in research. It was originally designed to protect excisions during healing but proves to be compatible with infusion system and dermal applications.
	MHBF00

# Swivels & Jackets

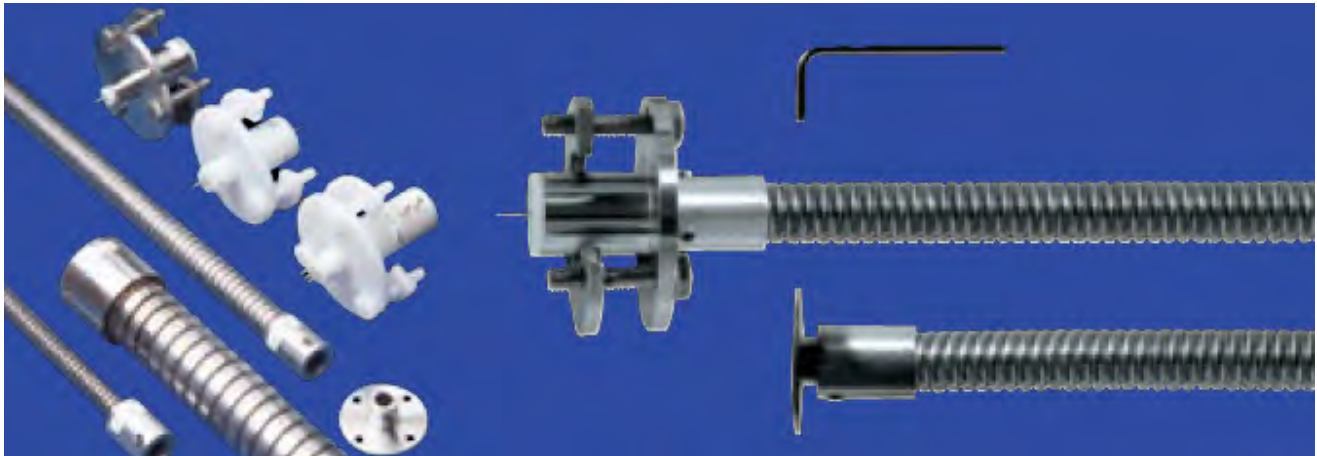
## Small Animal Infusion System

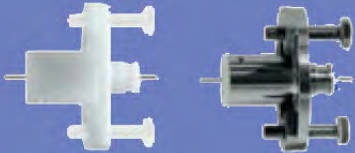
Jackets					
		<p>Standard Rodent Jackets are made of double layers of Lycra/Spandex fabric with Velcro fasteners for adjustment and secure fit. Available in standard sizes to order by weight range of your animals.</p> <p>Custommade jackets are available on request. Just let us know what you are looking for and we will help you create the perfect jacket for you.</p>			
RAT Jackets		Weight range			
		X small 100-150g	small 150-250gr	medium 250-350gr	large 350-500gr extra large 500+
		RJ00	RJ01	RJ02	RJ03 RJ04
Insert, standard (delivered with each jacket)		RJIN			
Insert - dermal		RJIND			
Insert - with pocket		RJINP			
Mouse Jackets		Weight range			
			small up to 25gr	medium 25-30gr	large +30gr
			MJ01	MJ02	MJ03
Insert, standard (delivered with each jacket)		MJIN			
Insert, dermal		MJIND			
Insert- with pocket		MJINP			
Hamster Jackets		Weight range			
			small up to 100gr	medium 100- 175gr	large +175gr
			HJ01	HJ02	HJ03
Insert, standard (delivered with each jacket)		HJIN			
Insert, dermal		HJIND			
Insert, with pocket		HJINP			
Guinea Pig		Weight range			
			small up to 350gr	medium 350- 600gr	large +600gr
			GPJ1	GPJ2	GPJ3
Insert, standard (delivered with each jacket)		GJIN			
Insert, dermal		GJIND			
Ferret		Weight range			
			small up to 750gr	medium 750-1000g	large +1000gr
			FFJ1	FFJ2	FFJ3
Insert, standard (delivered with each jacket)		FJIN			
Insert, dermal		FJIND			


## *Swivels & Jackets*


### *Medium and Large Animal Infusion System*

*Rugged, Precise and versatile infusion systems, designed and fabricated to operate accurately and meet criteria for procedures involving larger animals, rabbits, dogs, primates, swine and farm animals.*



Swivels				
		<p>Single-fluid channel models made from high-impact plastic or stainless steel.</p> <p>Double and triple channel models for simultaneous applications are made from high-impact plastic.</p> <p>All large swivels come with a “c” clamp and are reusable.</p>		
		Single Channel	Double Channel	Triple Channel Swivel
<b>High impact Plastic</b>	22 Gauge	ASP6		
	20 Gauge	ASP1	ASPF2	ASPF6
	19 Gauge	ASP5		
	18 Gauge	ASP2		ASPF7
	17 Gauge	ASP3	ASPF1	ASPF5
	16 Gauge	ASP4		
<b>Stainless Steel</b>	20 Gauge	ASS1	ASSF2	ASSF6
	18 Gauge	ASS2		ASSF3
	17 Gauge	ASS3	ASSF1	ASSF5
	16 Gauge	ASS4		

Tethers				
		<p>Constructed from flexible interlocking stainless steel. Machined aluminum end pieces are secured to swivels and end-plats by 2 set screws.</p> <p>Allows for ease of movement by the subject while eliminating interference and damage to the catheter.</p>		
	L = 61cm	L = 91,4cm	L = 121,9cm	L =152,4cm
<b>Large Animals (dogs, swine, etc)</b>	LAT2	LAT3	LAT4	LAT5
<b>Medium Animals (small primates, rabbits etc)</b>	BT01	BT02		

End - plates	
	<p>Made from a single piece of stainless steel for a durable and reliable connection to a reinforced anchor point on the jacket.</p>
	ATE1

# ***Jackets***

## *Medium & Large Animal*



Innovative design and down to the smallest detail the Medium & large Animal jackets fulfill all the demands placed on today's investigators. A single jackets will typically incorporate many materials, special featured and fabrication methods which combine to increase comfort for the subject, as well as ease of use for the handler.

A range of standard designs are available.

### **Necessary accessories.**

For procedures requiring ambulant equipment, we provide an endless choise of accessories suchs as: pockets to hold all manner of delicate equipement, anchoring points for tethering, attachments for restrainr systems, clips for collars or other attachments. velcro, snaps and other fasteners. Jackets and accessories become even more specialized when an innovative fabric is incorporated into the design.

### **Custom made jackets.**

In our experience we learned that it is important to know up front what your requirements will be, in order to deliver you a well fitting, easy to work with jacket. It is therefore that we often ask you to fill in a measurement form and inform us about you application needs. Specially when ordering larger number of jackets we prefer to work with a prototype first.

### **Telemetry Jackets**

Telemetric jackets and undershirts for various external telemetric systems are available. Since these telemetry systems continue to evolve so do the jackets. Please contact us for more information about the possibilities. A range of standard telemetry jackets are available for the most commonly used systems.

### **Species**

The jackets are manufactured for every animal species used in today's laboratories including: rodents, canines, non-human primates, swine, ruminants, rabbits. cats and many more. You can order jackets by weight, body measurements and study requirements.

**The next pages contain information on standard size jackets.**

**Please call for more information; +31316524451 or email [info@unobv.com](mailto:info@unobv.com) and we will contact you.**

## *Jackets*

### *Medium and Large Animals*

JACKETS - STANDARD MODEL			
	Bodyweight	Size	Ordering Code
<b>RABBIT</b>	up to 2,7Kg	X-small	BJ01
	2,7 - 3,6Kg	Small	BJ02
	3,6 - 4,5Kg	Medium	BJ03
	4,5 - 5,4Kg	Large	BJ04
	5,4Kg up	Extra Large	BJ05
<b>RABBIT DERMAL</b>	2,7 - 3,6Kg	Small	BJ02D
	3,6 - 4,5Kg	Medium	BJ03D
	4,5 - 5,4Kg	Large	BJ04D

	Bodyweight	Size	Ordering Code
<b>DOG</b>	2,5 - 5Kg	X-small	DJ01
	5 - 7Kg	Small	DJ02
	8 - 12Kg	Medium	DJ03
	13 - 18Kg	Large	DJ04
	18- 25Kg	Extra Large	DJ05

	Bodyweight	Size	Ordering Code
<b>PRIMATE</b>	up to 2 KG	X-small	PJ00
	2 - 3Kg	Small	PJ01
	3,5 - 5Kg	Medium	PJ02
	5,5 - 7Kg	Large	PJ03
	7 - 8 Kg	X- large	PJ04
	8 - 10Kg	XX Large	PJ05
	10Kg up	XXX Large	PJ06

	Bodyweight	Size	Ordering Code
<b>BABOON</b>	up to 8Kg	Small	PJ01B
	8 - 12Kg	Medium	PJ02B
	12 - 15Kg	Large	PJ03B
	15 - 20Kg	X- large	PJ04B
	20 - 25Kg	XX Large	PJ05B

	Bodyweight	Size	Ordering Code
<b>SQUIRREL MONKEY</b> (Saimiri sciureus)	up to 600gr	Small	PJ01Q
	600-750gr	Medium	PJ02Q
	750-950gr	Large	PJ03Q
	950gr up	X- large	PJ04Q

JACKETS - STANDARD MODEL			
	Bodyweight	Size	Ordering Code
<b>Yucatan Swine 3/4 length</b>	20Kg	Small	SSJ1YU
	20-30Kg	Medium	SSJ2YU
	30-50Kg	Large	SSJ3YU
<b>Juvenile Yorkshire Swine 3/4 length</b>	10-15Kg	Small	SSJ1YJ
	20-30Kg	Medium	SSJ2YJ
	35-40Kg	Large	SSJ3YJ
<b>Adult Yorkshire Swine 3/4 length</b>	30-50Kg	Small	SSJ1YA
	50-60Kg	Medium	SSJ2YA
	60-70Kg	Large	SSJ3YA
<b>Ellegaard Göttingen Minipig 3/4 length</b>	10-15Kg	Small	SSJ1GEM
	15-20Kg	Medium	SSJ2GEM
	25-30Kg	Large	SSJ3GEM

#### *Telemetry System:*

*Please contact us for the standard jackets designed for*

*\* **DSI Jet***

*\* **EMKA.***

*Or call for you custom made design!*

EXTRA's		POCKETS	
<b>All jackets...</b>	for 3/4 length jackets, add -Q to ordernumber	7,6 x 17,8 x 5cm	JP01
	for extra panel, add -P to ordernumber	17,8 x 14 x 3,8cm / 28cm zipper	JP03
	for domes, add -D to ordernumber	15,2 x 10,2 x 5cm / 17,8cm zipper	JP04
		13,3 x 8,9 x 3,8cm	JP05
		Attachable pocket	Add - A to ordering code

## *Undershirts*

### *Medium & Large Animal*

As scientific procedures become much more refined, a need for a range of undershirts for laboratory animals raised. undershirts are an effective means of securing electrodes, connectors, Fentanyl patches or any piece that needs to be kept in contact with the skin. Customers found undershirts to be an alternative to bandaging and wrapping animals, either before placing an outer jacket or even on their own.



Undershirts are made from smooth spandex fabric to provide a tight fitting garment which reduces rubbing and chafing. Models close and adjust with either Velcro fasteners or plastic zippers. As with all our products the undershirts are available for all medium and large animals with a complete range of sizes. You have a choice of color coding to distinguish sizes or treatment groups.

	Bodyweight	Size	Ordering Code
Dog	5- 7Kg	Small	DJ02CAB
	8-12Kg	Medium	DJ03CAB
	13-18Kg	Large	DJ04CAB
	+18Kg	X-Large	DJ05CAB
Primate	2 - 3Kg	Small	PJ01CAB
	3,5 - 5Kg	Medium	PJ02CAB
	5,5 - 7Kg	Large	PJ03CAB
	7 - 8Kg	X-Large	PJ04CAB
	8,5- 10Kg	XX-Large	PJ05CAB
	+10Kg	3X-Large	PJ06CAB

In collaboration with manufacturers of certain external telemetry systems special undershirts were developed as well.



## *Collars*

### *Elizabethan, Cervical and Pillow*

The collars are designed and manufactured to reduce or eliminate many of the factors which can compromise investigations. In protecting sensitive equipment and reducing discomfort and stress levels for the animals, this comprehensive range helps to protect the integrity of a wide variety of procedures on all laboratory animal species. A large range of standard sizes are available. For other sizes or special needs, contact us. Custommade collars are available.

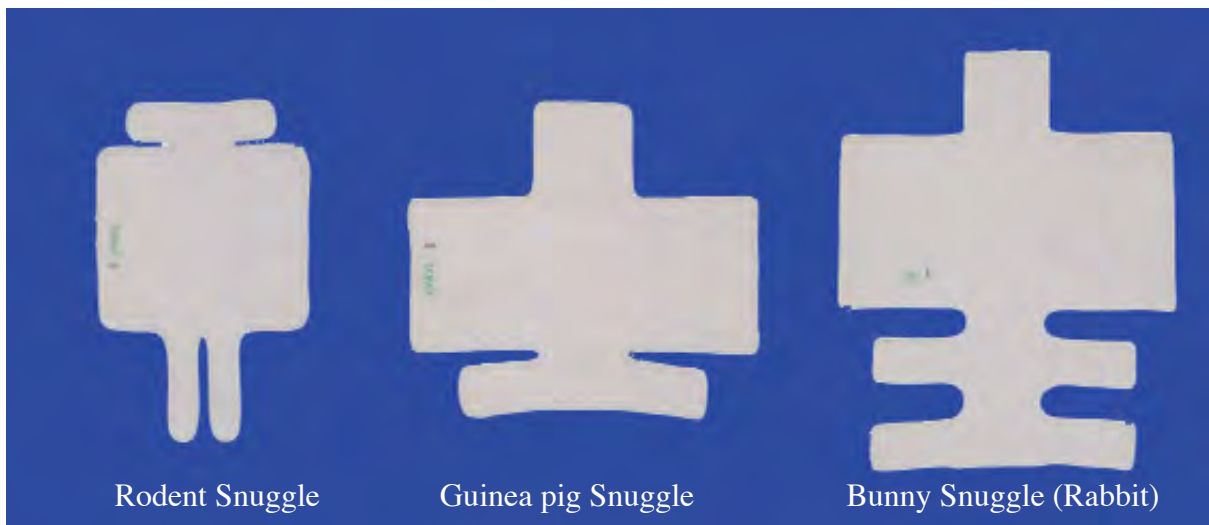


ELIZABETHAN COLLARS
<p><b>Prevent animals from self grooming and protect surgical or treatment sites.</b></p> <p>Manufactured from a low density polyethylene and close with ample velcro fasteners, providing adjustable and secure fit for individual animals. Neck openings are bound with cotton jersey for comfort.</p>
CERVICAL COLLARS
Offer an alternative to Elizabethan collars, allowing the animal unrestricted vision.
PILLOW COLLARS
<p>Are designed for use in a wide range of applications.</p> <ul style="list-style-type: none"> <li>• May be used in combination with an infusion jacket</li> <li>• For protection of devices such as infusion pumps</li> <li>• For protection in post surgical or treatment situations</li> <li>• Made from durable, washable canvas and available with optional fasteners for jacket or harness attachment. The foam pillow insert is removable. Available in black or white in a range of sizes. Custom model are available.</li> </ul>

Animal Species	Weight range	ELIZABETHAN COLLARS	CERVICAL COLLARS	PILLOW COLLARS
Mouse		MCE1	MCS1 (stainless steel)	N.A.
Rat	up to 450gr	RCE1 small	RCS1 (stainless steel)	N.A.
	450g +	RCE2 large	RCS1 (stainless steel)	N.A.
Guinea Pig	upto 350gr	GPE1 small	N.A.	N.A.
	350-600gr	GPE2 medium	N.A.	N.A.
	600 gr +	GPE3 large	N.A.	N.A.
Rabbit	up to 2,7kg	BCE0 X-small	N.A.	N.A.
	2,7-3,6kg	BCE1 small	BC01 small	BC01SPM small
	3,6 -4,5kg	BCE2 medium	BC02 medium	BC02MMM medium
	4,5-5,4kg	BCE3 large	BC03 large	BC03LGS large
Dog	5 - 7 kg	DCE1 small	DC01 small	DC01SPM small
	8-12 kg	DCE2 medium	DC02 medium	DC02MMM medium
	13- 18 kg	DCE3 large	DC03 large	DC03LGS large
	18-25 kg	DCE4 X-large	DC04 X-large	DC04XLG X-large

## Snuggle Restrainers

The ultimate in stress-free immobilization and versatility for procedures involving, rodents, guineapig or rabbit subjects.



### Handle with Care!

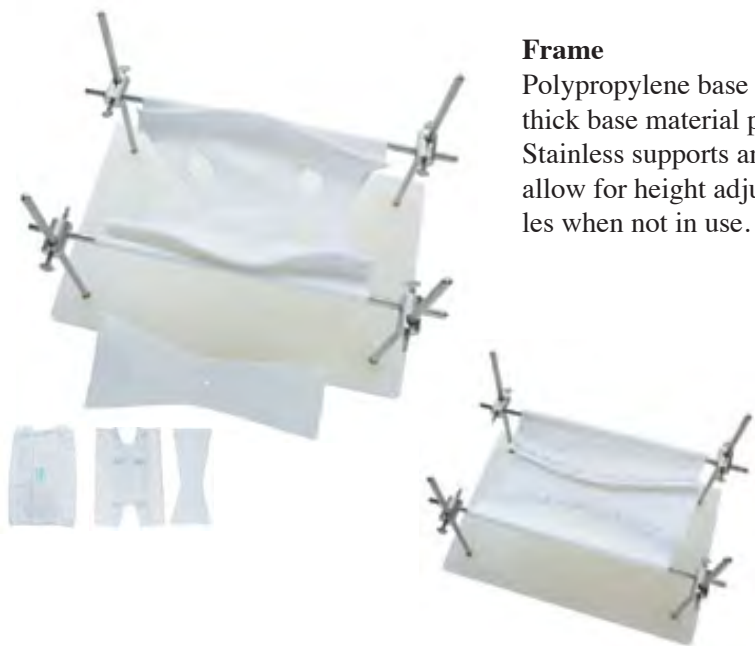
Small animals are prone to stress and require extra care in handling. mechanical restraints frequently require the involvement of two persons; one to restrain and one to perform. The resulting stress and discomfort for the subject can often jeopardize the efficiency of the procedure. The Snuggle uses the principle of a cocoon rather than a rigid structure for immobilization. The multiple flaps perform two functions; they are adjustable around the subject for effective yet comfortable restraint, and positioned, or left open for access depending on the procedure. Both restraint and procedure can be carried out by one handler.

### Blood Collection, Vaginal Samples, Bolus Injection, Veterinary Exams, Transport and more...

The Snuggles are manufactured from flexible yet extremely durable canvas fabric. the fabric is coated with Nylon to facilitate laundering for reuse. Wide flaps with velcor fasteners allow for maximum flexibility, ease of use and adjustment for fit between individual subjects. The Snuggles are available in different sizes for a complete range of animals including pregnant females.

	Bodyweight	Size	Ordering Code		Bodyweight	Size	Ordering Code
Mouse	up to 25gr	Small	MS01	Guinea Pig	up to 350gr	Small	GPS01
	25-30 gr	Medium	MS02		350-600gr	Medium	GPS02
	30gr up	Large	MS03		600-750gr	Large	GPS03
					750gr up	X-Large	GPS04
Rat	100-150gr	X-Small	RTS00	Rabbit	up to 3,5kg	Small	BS01
	150-250gr	Small	RTS01		3,5 - 5kg	Medium	BS02
	250-350gr	Medium	RTS02		5 - 7kg	Large	BS03
	350-500gr	Large	RTS03		7kg up	X-Large	BS04
	500gr up	X-Large	RTS04				

*Rodent restraint slings*  
*Small Animals*



**Frame**

Polypropylene base with supports made from stainless steel, one inch thick base material provides a robust support that does not move. Stainless supports and connectors held with convenient thumbs screws allow for height adjustments. The frame is easily cleaned and dismantles when not in use.

	Bodyweight	Size	Ordering Code		Bodyweight	Size	Ordering Code
Rat	Sling and cover		RFS1	Guinea Pig	Sling cover		RFS1
	150-250gr	Small	RSFC1		up tot 350gr	Small	GPFC1
	250-350gr	Medium	RSFC2		350-600gr	Medium	GPFC2
	350-500gr	Large	RSFC3		600-750gr	Large	GPFC3
	500gr up	X- Large	RSFC4		750gr up	X-Large	GPFC4

**Restraints**

Full body restraint is provided with the choice of either a sling suit or sling cover. Both restrainers allow for access to all limbs and the head and tail, all close with Velcro fasteners allowing for a quick and secure restraint and adjustable fit for individual animals. Sling suits are sold in five sizes according to the weight range of the animals. The rodent sling cover is available in a single size for rats up to 500g. Custom sizes are available on request.



Slings can be used to securely restrain rodents during many procedures. Choice of restraint in many sizes and range of adjustment make the rodent sling a valuable asset to any laboratory setting. Other small animal species may also be restrained using the same frame with suits and slings available for mice and guinea pigs.

# Mobile restraint Unit

## Large Animals

A stable immobile and comfortable subject is a key component of any investigation or procedure involving large animals. The innovative Mobile Restraint Unit embodies the most efficient incorporation of all the necessary features. Combined with quality materials and attention to detail and workmanship, this device is unique in providing humane immobilization for the animal and efficient, safe, working platforms for the handler.

Special Requirements? While our inventory of frames and slings will answer the needs of most customers, we are fully equipped to fulfill orders requiring the fabrication of custom-made units for special situations or tasks.

### Frame construction

1. Deep “V” opening in frame for unimpeded access to the head of the animal.
2. Low cross members and deep opening for minimum lifting height and easier positioning of animal.
3. Sling Support bar extenders for lifting. Removable to facilitate access to the animal during procedure and prevent snagging during movement.
4. Available in a range of sizes. Constructed from precision welded 1” square tube stainless steel stock for lightness and strength.



### Sling construction

1. Basic construction of robust, washable canvas type material.
2. Wide reinforced side tubes for easy insertion and removal of adjustable side support bars.
3. All leg and waste apertures edged in cotton jersey for additional comfort.
4. Nylon webbing sewn in at key points throughout for additional strength.



Self-locking, quick release cleats for limb ropes at each corner.



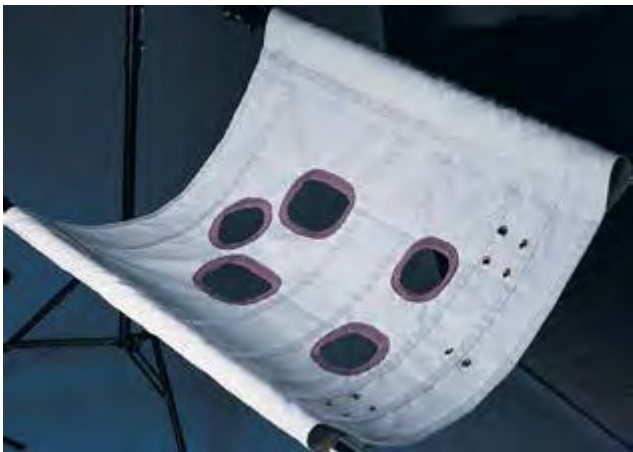
Lower sling support bar brackets for easier access.



Locator pins on all corners to adjust sling support bars.



Corner posts on heavy duty castors with ball-bearing pivots, two with foot activated brakes.



	Frame	Cover-hammock
DOG	DFH1PU	DFC1PU
SWINE	SFH1PU	SFC1PU

## *Portable Parapinto slings*

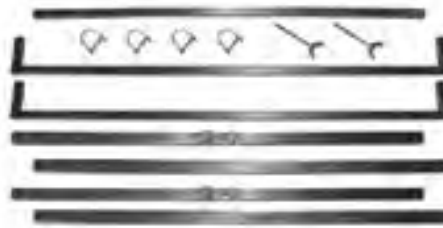
### *Large Animals*

Exclusively available, this newest innovation in comfortable restraint is collapsible and lightweight. It can be quickly & easily folded up for trouble-free transport or storage in facilities with limited space or mobile veterinarians.



Humane, user-friendly, portable restraint for your micropigs, minipigs, dogs, goats, lambs and other small to medium sized animals. Truly portable the complete sling ships in a carton 101x25,4x15cm weighing 9kg so it can be shipped inexpensively using your preferred courier service.

The portable Panepinto sling is supplied with instructions for assembly, storage and handling.



Deep V shaped openings at the front and back for unimpeded access to the animal allowing of easy ampling or instrumentation. Set up and dismantling is simple requiring no tools. Clevis pins lock the frame in place, for storage either fold closed and hang on hooks or use the storage bag, included with your purchase. To maintain a light weight with maximum strength the frame is constructed from square tubular stainless steel. The sling is manufactured from a robust coated canvas fabric. The sling is machine washable. All openings on the sling are trimmed with a cotton jersey fabric for comfort. Velcro straps closing over the back provide for quick and secure restraint while maintaining adjustable fit for individual animals.

	Frame	Cover
	PPFH1PU	PPFC1PU



# Animal Handling Gloves

## Small Animals



New superior cut resistant gloves for animal handling. Gloves are suitable for the safe handling of small laboratory animals including rodents. T/FLEX® PLUS gloves are a 13 gauge seamless knit shell; material is Dyneema® engineered fibers plated with Lycra® - Spandex®, Thermax® and the antimicrobial treatment Alphasan® combine to provide a comfortable glove featuring the highest cut resistance. Gloves conform to international safety standards for cut resistance.

	Size	Ordering code
	X-small	HG013G6
	Small	HG013G7
	Medium	HG013G8
	Large	HG013G9
	X-Large	HG013G10

## Small Primates



When handling small animals such as New World primates dexterity coupled with protection is vital for the security of both the subject and handler. The small primate handling gloves offer a smart solution for protection during long periods of wear. Manufactured from a soft yet durable goat skin, these gloves are a comfortable fit and lined with knitted Kevlar to provide extra protection and slash resistance.

	Size	Ordering code
	Small	HG011KS
	Medium	HG011KM
	Large	HG011KL
	X-Large	HG011KX

- Goat skin leather, thin yet strong and durable
- Lined with Kevlar for slash resistance
- Soft and form fitting will not crack or harden after wetting



Kevlar lining provides extra protection from slashing and tearing.

## *Animal Handling Glove*

### *Large Animals*

A complete integrated protection system for animal handlers and their subjects. To safeguard personnel while handling animals, Lomir manufactures a complete range of handling equipment designed and fabricated for flexibility, comfort and safety during long periods of wear.

No other company offers such a range of sizes; Small Medium, Large and X-Large. Available as pairs or singles.

**Leather Gauntlets** - Full fingered, full length gauntlet. Glove section made from 100% cowhide; elbow length cuffs made from split grain cowhide. Ruggedly constructed with internal seams throughout for optimum protection and durability. Kevlar lining for security while maintaining manual dexterity. Available in two cuff lengths.



**Leather Doublers** - For the highest level of protection, a 100% cowhide doubler is available with heavy duty snaps for attachment over the handling gauntlets. Full thumb and index finger closure.



**Kevlar® Arm Protectors** - Arm protectors made from 100% fine-knit Kevlar® with sewn-in reinforcement. Designed to be worn either on their own or beneath a pair of animal handling gloves.



Leather Gauntlets		
	Size	Ordering Code
	Small	HG01S
	Medium	HG01M
	Large	HG01L
	Extra Large	HG01X
With Kevlar	Size	Ordering Code
	Small	HG02S
	Medium	HG02M
	Large	HG02L
	X-Large	HG02X
	XX-Large	HG022X
	XXX-Large	HG023X

Add on Shield		
	Size	Ordering Code
	Small	HG03S
	Medium	HG03M
	Large	HG03L
	Extra Large	HG03X
	XX-Large	HG03XX
Arm Protectors		
	Size	Ordering Code
	35cm	HG07K
	45cm	HG08K



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