

Dolphin<sup>®</sup> Pediatric Fluid Immersion Simulation<sup>®</sup>  
Advanced Therapy Surfaces



Improves patient comfort by minimizing soft tissue deformation

Prevents and treats wounds by simulating immersion of the patient in a fluid medium

Improves clinical outcomes by maintaining near normal blood flow

Automatically adjusts to each patient's weight, surface area and repositioning

Initially developed for dry transport of specially trained U.S. Navy dolphins, Dolphin Fluid Immersion Simulation (FIS) is a unique breakthrough technology that automatically simulates a fluid environment, maintaining near normal blood flow, minimizing soft tissue distortion, and optimizing tissue oxygenation. The Dolphin Pediatric FIS System addresses the wound healing and prevention needs of clinically complex pediatric patients providing enhanced patient comfort, improved clinical outcomes, and better clinician ergonomics.



## How It Works

Dolphin FIS system utilizes complex algorithms and a microprocessor to precisely adjust the surface and optimize for each patient's unique anatomical features. It automatically calculates the exact settings needed to simulate floating in a fluid medium.



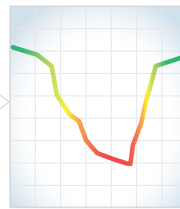
### Step 1

Patient lies down and the FIS system begins to work

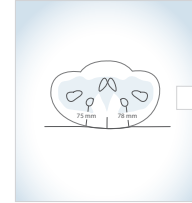


### Step 2

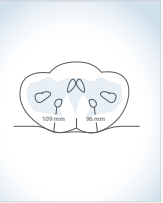
FIS system automatically calculates the exact settings needed to mimic immersion in a fluid medium to relieve any contact pressure



### Standard Surface



### Dolphin FIS



### Step 3

Soft tissue distortion is minimized and near normal blood flow is maintained

## Pediatric Advanced Therapy Surface Specifications

	Length	Width	Thickness	Weight Capacity
Pediatric FIS Mattress	82" (180.4 cm)	35" (77 cm)	8" (17.6 cm) or 10" (22 cm)	5 - 300 lbs.
Pediatric Crib Mattress	57" (125.4 cm)	29.5" (64.9 cm)	5" (11 cm)	5 - 300 lbs.
	50" (128 cm)	28" (71 cm)	4" (10 cm)	

## Electronics

**North America:** UL 60601-1, CAN/CSA C22.2 No. 601.1

**Europe:** Conforms to IEC/EN 60601-1 and IEC/EN 60601-1-2 CE

## Environmental Conditions

	Ambient Temperature	Relative Humidity
Operating Conditions	10° C to 40° C (50° F to 104° F)	30% to 75% Non-Condensing
Storage and Shipping Conditions	10° C to 40° C (50° F to 104° F)	10% to 100%

The Fluid Immersion Simulation technology of the Dolphin System reduces soft tissue distortion and promotes blood flow, creating a platform that is highly effective for the prevention and healing of pressure ulcers through Stage IV, as well as, treating patients with post-operative flaps and grafts. The Dolphin FIS System may also be used for patients whose medical condition precludes turning and repositioning, or where these interventions may be contraindicated as they place the patient at risk for further compromise, as well as, patients with spinal cord injury once the acute injury has been stabilized and these patients have been cleared by a physician. In all cases, Joerns clinical indications are guidelines and should be taken only as recommendations for consideration during individual patient assessment by the clinician.