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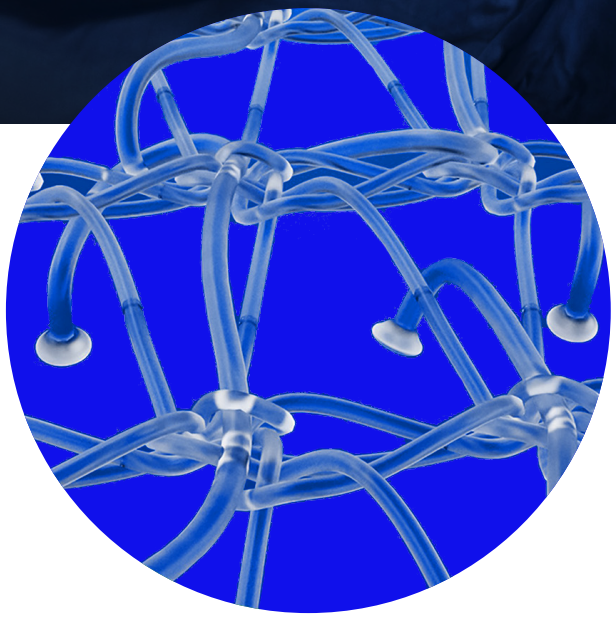
Technique guide

ProGrip™ self-gripping polypropylene mesh

This guide covers techniques and considerations for using ProGrip™ self-gripping polypropylene mesh in open extraperitoneal ventral hernia repair surgery. Surgeons will determine proper techniques for starting and completing the procedure – including closing the hernia defect.†



Resorbable ProGrip™ technology is on one side of the mesh.

†This guide is not intended to constitute medical advice or in any way replace the independent medical judgment of a trained and licensed physician with respect to any patient needs or circumstances. The physician is solely responsible for all decisions and medical judgments relating to the treatment of their patients.

Sizes you need. Grips you love.

- Polylactic acid (PLA) resorbable microgrips support good tissue integration[1,†] and prevent the mesh from shifting during placement[2,‡,§]
- Uniform fixation across the mesh surface[3,Ω,††,‡‡]
- Reduced need for additional fixation,[4,††,‡‡] eliminating associated pain[4-11,‡‡]
- Faster mesh placement (including fixation) compared to flat sheet meshes[2,‡,§§]

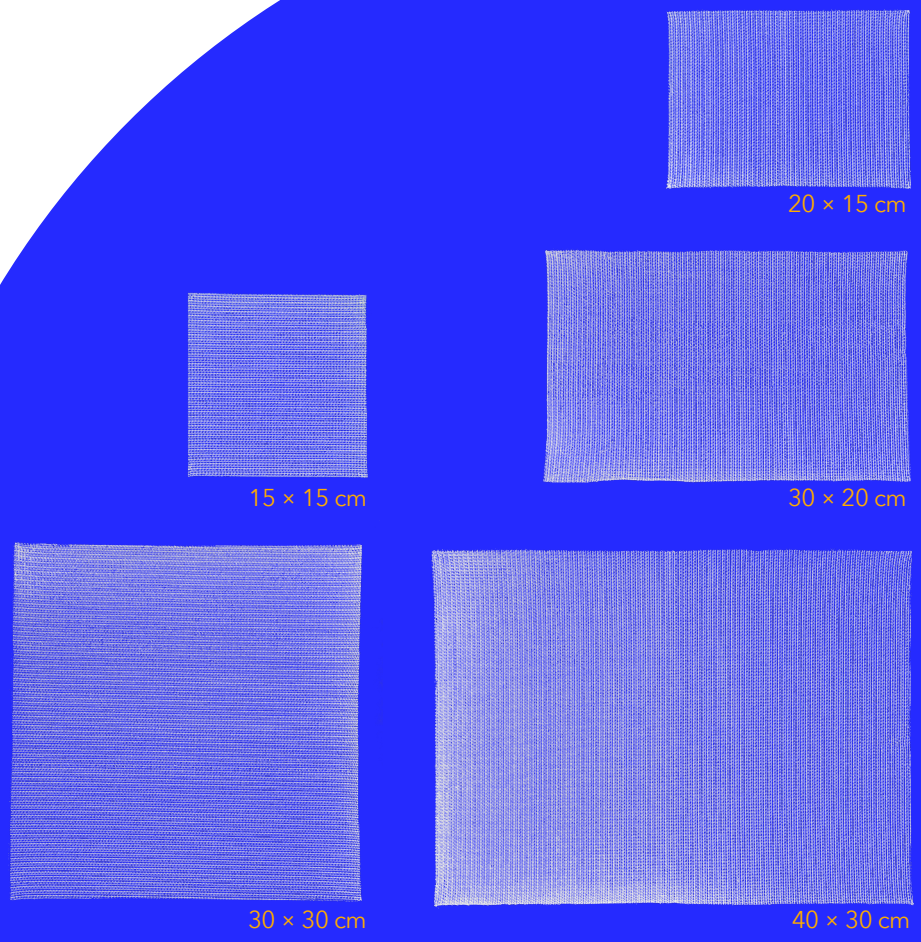


Figure 1. ProGrip™ self-gripping polypropylene mesh sizes for open extraperitoneal ventral hernia repair surgery.

1 Select mesh size

After closing the hernia defect, select the appropriate mesh size for the repair of the ventral hernia. Choosing the proper size will provide ample coverage of the soft tissue to be reinforced (Figure 1).

Caution: The placement of the mesh should assure necessary overlap beyond the margins of the defect, according to the surgeon's practice. When possible, a minimum of 5 cm overlap over the edges of the defect is recommended for ventral hernia repairs.

Mesh may be trimmed to the desired shape or size.[11-13,††] Trimming the mesh will not impact its mechanical characteristics.[13,‡]

†Based on animal study, not necessarily indicative of human clinical outcomes. ‡Based on preclinical data, not necessarily indicative of human clinical outcomes. §Based on feedback from 6 surgeons, conducted in lab setting with cadaver. Surgeons compensated. ΩThe technique used to fixate the mesh (suture and/or tacks) is left up to the surgeon. ††Based on benchtop data, not necessarily indicative of human clinical outcomes. ‡‡The textile self-gripping feature makes it possible to position the mesh without fixation, depending on the size of the defect, the hernia position, and the quality of the anatomical structures. §§Based on feedback from 6 answers, 5 surgeons (83%), conducted in lab setting with cadaver. Surgeons compensated.

Position the mesh

Determine which side of the mesh has ProGrip™ technology and decide whether to place that side facing up or down.

Caution: The mesh should not be placed with grips towards the peritoneum, nor in direct contact with the abdominal viscera.

Note: If mesh is folded with grips facing each other, it will be easy to release the area and unfold the mesh.

Mesh transparency aids in visualization and for centering over the defect that needs reinforcement (Figure 2).[2,13,†,‡]

Figure 2.
Mesh deployed so edges are beyond the repaired hernia and centered over the defect.

Deploy the mesh

Once correctly positioned, apply gentle pressure to deploy the mesh (Figure 3). The presence of grips on one side makes the mesh conform to the anatomy and prevents mesh shifting during placement.[2,†,‡]

After deployment, if the mesh doesn't fit in the anatomical space, dissect further or trim the mesh.

ProGrip™ self-gripping polypropylene mesh can be repositioned easily if needed.[2,†,‡]

If the mesh is placed with grips facing up, toward the body wall, it will attach to the body wall tissue once the incision is repaired (Figure 4). Keep the mesh flat while closing the incision.

Note: One technique to keep the mesh flat is to lift the body walls up off the mesh, pull these towards the center, and place down onto the mesh before closing the incision.

ProGrip™ technology will contribute to fixation of the mesh.[4,§,Ω] Each surgeon can determine techniques to further fixate the mesh.[††]

If additional fixation is used, fixate approximately 1 cm from the edge of the mesh.

Important: Always refer to the instructions for use (IFU) supplied with the product for complete instructions, indications, contraindications, warnings, and precautions.

Figure 3.
Deployment of the mesh, starting from the center and then moving to the edge.

Figure 4.
Illustration of the grips facing up. Grips will attach to the tissue once the incision is repaired.

†Based on preclinical data, not necessarily indicative of human clinical outcomes. ‡Based on feedback from 6 surgeons, conducted in lab setting with cadaver. Surgeons compensated. §Based on benchtop data, not necessarily indicative of human clinical outcomes. ΩThe textile self-gripping feature makes it possible to position the mesh without fixation, depending on the size of the defect, the hernia position, and the quality of the anatomical structures. ††The technique used to fixate the mesh (suture and/or tacks) is left up to the surgeon. Compatibility with other fixation devices may not have been established. Using means of fixation other than those for which compatibility is established may lead to mesh damage. If tacks are used to fixate the mesh, the use of Medtronic fixation devices are recommended. The textile self-gripping feature makes it possible to position the mesh without fixation, depending on the size of the defect, the hernia position, and the quality of the anatomical structures.

Scan QR code

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Ventral risk statement (PP1515G, PP2015G, PP3020G, PP3030G, PP4030G): Mesh complications may include but are not limited to acute and chronic pain, extrusion/erosion, hematoma, infection, inflammation, recurrence, and/or seroma. The compatibility of ProGrip™ self-gripping polypropylene mesh with trocars and laparoscopic instruments has not been established. Do not place the mesh in direct contact with the viscera. Direct contact with the viscera may lead to risks of adhesions, fistula formation, and bowel obstruction. Do not implant the mesh in an intra-peritoneal position. When implanting in a pre-peritoneal site, the mesh shall be placed with the grips towards the muscle fascia with the mesh completely covered with peritoneum.

References:

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