The Next Steps in Limb Salvage


This is a great time to be introducing the 2016 critical limb ischemia (CLI) issue. This issue heralds the global approach to CLI treatment, not only in terms of the origin of the authors who have contributed to this issue, but also in that the treatment of CLI is no longer solely limited to revascularization and involves dedicated multidisciplinary teams.

This year, we have a broad spectrum of combined therapy and data to share. Just a few years ago, when discussing CLI, operators thought of only a few devices that could be used to treat primarily proximal to mid tibial vessels. In the span of less than 7 years, the opportunities for CLI patients have developed from a simple trial of plain-old balloon angioplasty into a broad spectrum of therapies that include many new tools that have advanced the field of revascularization. These tools include low-profile access sheaths, wires, catheters, balloons, and stents, as well as atherectomy devices specifically designed for the arterial territories involved. When discussing the global approach to CLI therapy, the option of drug-coated technologies should of course be mentioned.

It is an absolutely exciting time to see how far we have come over just the last decade—from proximal to mid tibial angioplasty into a full scope of revascularization that includes complete reconstruction of proximal and mid tibials and, more recently, pedal loop revascularization. Pedal loops were thought to be the last frontier of CLI therapy, only to find that digital revascularization and arterialization of tibial veins provide even more options.

Additionally, gene and cell therapy are evolving as potential therapeutic options, and we hope to learn their true value soon. The anatomical composition of the infrainguinal vessels is coming to be understood as having significant transitions in wall composition from the superficial femoral artery all the way down to the pedal vessels. This knowledge has now been translated into the ability to change our approach and the type of technology we use to treat different vessels. An in-depth understanding of the multivessel, multilevel complexities of CLI is extremely valuable in our quest for answers for the right approach to tackling this disease.

The articles in this overview of the current CLI landscape include case-based approaches, evaluative and perioperative imaging techniques, available devices, a review of the data, outpatient care options, and more.

We hope that you find this update on CLI care to be useful in your practice, and we can't wait to see where the future will take us in the years ahead! ■

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