

Preface

The "Vascular Graft Update: Safety and Performance" ASTM Symposium was held 27 and 28 Nov. 1984 at Colonial Williamsburg, Williamsburg, Virginia. This symposium was sponsored by the ASTM Committee F-4 on Medical and Surgical Materials and Devices and its Subcommittee F04.04 on Cardiovascular Implants and Materials. Cosponsors of the meeting were the Food and Drug Administration (FDA), the International Center for Artificial Organs and Transplantation (ICAOT) Cleveland, Ohio, and the Department of Health and Human Services.

The major goal of this symposium was to discuss and examine the present system for the manufacture and testing of standard grafts in clinical use. The emphasis was placed on current technical advances that will influence or are now influencing the design, safety, effective use, and management of vascular graft prostheses. It is hoped that this conference was the initial step in stimulating a greater interest in the evaluation and safety of current graft prostheses, and will lead to rational standards for vascular materials. The impetus has come from the Food and Drug Administration (FDA) whose interest lies in the development of standards for vascular grafts. The variety of implantable products available on the market and the different materials manufactured in several configurations has led to specialized classes of graft products and techniques, each with their own specific merits, and disadvantages. The term vascular graft pertains to all the various types of blood vessel substitutes.

Considering the growing use of these prostheses as effective and permanent vascular substitutes, it appears that the major issues concerning their design, manufacture, and use have not yet been resolved. The issues addressed at this Symposium included blood compatibility as well as durability test methods and the establishment of minimum safety and effectiveness requirements for each type of graft. The primary role of standards development for this industry reflects the philosophies of the manufacturer, the surgical community, and the standard development organization. This symposium considered research, development, and clinical applications of all major types of vascular grafts. There were *over 300* participants from Europe, Japan, and the United States.

All the papers presented, together with the additional contributions and the discussions are printed in this volume and grouped in the four sessions shown in the Contents List. There was also an Exhibition on Vascular Grafts prepared by the International Center for Artificial Organs and Transplantation.

The editors acknowledge with gratitude their indebtedness to the following for organizing the Symposium program: Drs. Y. Nosé, J. Anderson, S. Brown, Mr. R. Whalen, and the Program Committee who ably brought together the participants and made many of the arrangements that are necessary to make a symposium that attracts both national and international interest. Mr. R. Sansone of ASTM was instrumental in directing the Williamsburg symposium activities, and Ms. K. Greene coordinated the collection of manuscripts resulting in the timely publication of the proceedings. Lastly, the efforts of each author resulted in the timely submission of manuscripts.

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