CONTENTS

5.

Preface to the First Edition Preface to the Second Edition	ix xiii
1. Major Codes and Standards	1
2. Metric versus U.S. Customary Measurement	11
3. Selection and Use of Pipeline Materials	19
4. Piping and Pipeline Sizing, Friction Losses, and Flow Calculation	\$ 33
5. Piping and Pipeline Pressure Thickness Integrity Calculations	55
6. Straight Pipe, Curved Pipe, and Intersection Calculations	87
7. Piping Flexibility, Reactions, and Sustained Thermal Calculations	123
8. Pipe Support Elements, Methods, and Calculations	151
9. Specialty Components	169
10. High-Frequency versus Low-Frequency Vibration Calculations	195
11. Occasional Loads Calculations	215
12. Slug Flow and Fluid Transients Calculations	241
13. Fabrication and Examination Elements Calculations	259
14. Valves and Flow Control Calculations	281
Appendix Bibliography Index	301 391 393