Choosing a Standards-Based Mathematics Curriculum

Contents

Preface	
A New Generation of Mathematics Curricula	
About This Guide	
Part I: Background	
Chapter 1: What Is a Standards-Based Curriculum?	,
Mathematical Content	
Mathematical Processes	
Attitudes Toward Mathematics	16
Views of Learning and Teaching	
Summary	
Chapter 2: Getting Started: The "Big Ideas" of the Selection and Implementation Process	
Think Long Term	
Take a K-12 Perspective	
Know Your District's Current Situation	
Build Stakeholder Support and Commitment	
Identify and Support Teachers' Needs	
Part II: The Curriculum Selection Process	
Chapter 3: Creating a Selection Committee	20
Factors to Consider When Assembling a Committee	
Getting Started as a Committee	32
Choosing Curricula to Review	34
Chapter 4: Taking Stock: Assessing Current Resources and Future Needs	37
Gathering Information about Your Needs and Resources	
Methods for Gathering Information	
Summary	
Sample Questions: Needs and Resources Assessment	-
Chapter 5: Planning for Cross-Grades Transitions	
Pedagogy	•
Paying Attention to Cross-Grades Articulation	
Chapter 6: Developing and Applying Selection Criteria	
Mathematical Content	
Approaches to Teaching	
Approaches to Learning	
Presentation and Organization of Curriculum Materials	
Design and Use of Selection Criteria	
Summary	
Sample Selection Questions	64

Chapter 7: Cost Considerations	69
Capital and Operating Expenses	70
Supplementary Funding Sources	73
Timing Issues	74
Summary	75
Chapter 8: Piloting	77
Piloting Strategies	
Selecting Pilot Teachers	80
Assessing Your Pilot Phase	80
The Choice Not to Pilot	
Summary	82
Part III: Curriculum Implementation	83
Chapter 9: Teacher Support	87
Teacher Support is a Long-Term Prospect	
Changing Support Needs	88
Budgeting for Professional Development	99
Summary	100
Chapter 10: Community Support	101
Building Parent Understanding and Support	
Increasing Parents' Awareness and Understanding	102
Helping Parents Become More Supportive and Knowledgeable Resources for Their Children	106
Using Community Resources	8
Chapter II: Implementation Rollout	109
Adoption by Certain Schools	IIO
Adoption by One Grade Level at a Time	
Adoption by a Cluster of Grade Levels	
Adoption by Certain Classes or Certain Students	
Adoption by Certain Teachers	,
Beginning Your Adoption with Replacement Units	•
Full Implementation in One Year	
Chapter 12: Collecting Data about Implementation	
Collecting Information about Student Performance	II/
Implementation	
Planning Your Data Collection	
Afterword	
Acknowledgments	
Appendices	131