

Contents

<i>List of Contributors</i>	vii
<i>Preface</i>	ix
<i>Contents of Other Volumes</i>	xiii
1. Trifluoroacetic Acid	
JOHN B. MILNE	
I. Introduction	1
II. Solvent Purification	2
III. Physical Properties and Solvent Structure	3
IV. Electrochemistry	16
V. Solubilities	22
VI. Reactions in Trifluoroacetic Acid	24
References	46
2. Halosulfuric Acids	
SARASWATHI NATARAJAN AND ALBERT W. JACHE	
I. Fluorosulfuric Acid	53
II. Chlorosulfuric Acid	138
References	147
3. The Interhalogens	
DOMINIQUE MARTIN, ROGER ROUSSON, AND JEAN-MARC WEULERSSE	
I. Introduction	158
II. Preparations and Problems of Purity	158
III. Physical Properties	161
IV. Chemical Properties—Halogenation	172
V. Solvent Properties	177
VI. Spectroscopic and Structural Studies of Some Halogen Fluorides	182
References	192

4. Inorganic Halides and Oxyhalides as Solvents

RAM CHAND PAUL AND GURDEV SINGH

I. Introduction	198
II. Antimony Halides	198
III. Arsenic Halides	206
IV. Nitrosyl and Nitryl Halides	216
V. Phosphoryl and Thiophosphoryl Halides	225
VI. Seleninyl Chloride	243
VII. Sulfur Halides and Oxyhalides	249
VIII. Tin(IV) Chloride	258
References	260

5. Molten Salts as Nonaqueous Solvents

D. H. KERRIDGE

I. Introduction	270
II. Halide Melts	271
III. Nitrate Melts	298
IV. Conclusions	320
References	320
Author Index	331
Subject Index	357