ARISTOTELIAN-THOMISTIC PHILOSOPHY OF MEASURE

AND THE

INTERNATIONAL SYSTEM OF UNITS (SI)

Correlation of International System of Units With the Philosophy of Aristotle and St. Thomas

Charles Bonaventure Crowley, O.P.

Edited with a Prescript by

Peter A. Redpath

University Press of America, Inc. Lanham • New York • London

Contents

Dedication		iii
Editor's Prescript		vii
Author's Preface		xliii
Acknowledgements		xlv
Author's Introduction		xlvii
Chapter 1	The Various Kinds of One Leading to Knowing What One Is	1
Chapter 2	The Nature of One	9
Chapter 3	The Quantity in Which the One That is a Measure is First Found	17
Chapter 4	Transference of the Notion of One as a Measure	25
Chapter 5	What is Common in All Measuring: Indivisibility	49
Chapter 6	The Properties of a Unit Measure	57
Chapter 7	Summary	63

Commentary		71
Part I	Base Unit For Mass	77
Part II	Base Unit For Length	97
Part III	Base Unit For Length: The Wave System of Measuring	123
Part IV	The Liter	141
Part V	Time	145
Part VI	Force	167
Part VII	Electricity	183
Part VIII	The SI Unit For Luminous Intensity: The Candela	207
Part IX	Supplementary Units: Unit Measure of Angles and Plane Angles	213
Part X	The SI Unit For Temperature: The Kelvin	217
Part XI	The SI Unit For Amount of Substance: The Mole	239
Conclusion		247
Appendix		249
Index of Names	·	263