ACKNOWLEDGEMENTS

I would like to express deep gratitude to my supervisor, Prof. Dr. Wolfram Saenger who provided good opportunities to accomplish my Ph.D. study in his laboratory, and initiated the collaborations to many research groups to do experiments with various techniques, e.g., X-ray diffraction with Dr. Günter Reck, Mr. Burkhard Schulz (Bundesanstalt für Materialforschung und -prüfung (BAM), Adlerhof, Berlin); neutron scattering with Dr. Ruep E. Lechner, Dr. Jacques Ollivier (Hahn-Meitner-Institut (HMI), Wannsee, Berlin); Raman spectroscopy with Prof. Dr. Heinz Welfle, Mr. Stefan Lättig (Max Delbrück Centrum (MDC), Buch, Berlin). I am very grateful to these persons as this Ph.D. thesis could not have been accomplished without their contributions. In addition, I have to thank Dr. Helga Hoier who took care and introduced me to the basics in crystallography, and Dr. Katrin Geßler for supports in the refinement of crystal structures.

I sincerely acknowledge the Thai government agencies and the Institute for the Promotion of Teaching Science and Technology (IPST) for giving me a Ph.D. scholarship under the Development and Promotion of Science and Technology Talents (DPST) Project, Deutsche Forschungsgemeinschaft, and Fonds der Chemischen Industrie for their partial financial supports.

At last but not least, I am absolutely obliged to my parents Mr. Sawasdee Aree, Mrs. Prapaipis Aree and girlfriend Ms. Chakreenuch Wichajarn who always strengthened my mind power to fight until I finally have a successful life for education today.

12 August 2000