

Foreword

This special volume “New Perspectives in Hydride Chemistry” was conceived as an attempt to address the imbalance that I perceived between the acknowledged emphasis on hydrides in transition-metal organometallic chemistry and the extensive, less trumpeted organometallic chemistry of non-transition metal hydrides that goes back more than a century. Accordingly, I approached about one hundred of the foremost practitioners of the art as judged by their publications in the major appropriate chemical journals, and a gratifying number responded positively. Their contributions are recorded here, and I am very grateful for their cooperation.

I myself can look back on over thirty years of activity in the field of metal hydrides. In a way, my pedigree extends back even further through my collaboration with Joseph Chatt, who, to the chagrin of at least one Nobel Prize winner, synthesised the first properly characterised transition-metal hydride without carbon lig-

ands. My initial foray was not a very promising augury, since what we claimed to be the first paramagnetic hydride turned out to be really a dinitrogen complex. This was before we had claimed any such complexes. Nowadays hydrides of all kinds are relatively common, and they are even recognised as being of biological significance. They may, indeed, be key intermediates in one of the outstanding problems still confronting bioinorganic chemistry, the mechanism of biological nitrogen fixation.

I hope that this volume will be seen as an overview of a field that is still expanding and developing, and that it will prove a useful review of the state of the subject at the end of the 20th Century.

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