



TABLE OF CONTENTS

- The Istituto Idrografico della Marina: The past, the present, the future (C. FIORI).....	7
- Petrel TSM 5424 three dimensional sonar for shallow water coastal hydrographic feature detection (C. ELLIS).....	19
- Towards adequate multibeam echosounders for hydrography (J. EEG).....	33
- Automatic detection of punctual errors in multibeam data using a robust estimator (N. DEBESE and H. BISQUAY).....	49
- Tsunami researchers outline steps for better data (H. YEH).....	65
- Network transformation from local geodetic system (ROMA 40) to WGS-84, for an international map of geocentric ellipsoid (R. GARGIULO and A. VASSALLO).....	71
- Use of GPS for a berthing guidance system (M. UENO).....	79
- Applications of kinematic GPS at SHOM (M. EVEN).....	95
- Augmentation of GPS for hydrographic applications under signal masking (S. RYAN, J. STEPHEN, J.H. KEONG, G. LACHAPELLE and R. HARE).....	105
- Digital tide tables - A necessity for navigation in the electronic age (B. PILLICH, C.T. O'REILLY and F.E. STEPHENSON).....	123
- The next generation paper chart (P.N. HOLROYD and D. MONAHAN).....	133
- U.S. Naval Oceanography and the Role of AUVs (J. A. BUNCE, J. WADDELL, J. B. BOATMAN and J. CARROLL).....	139
- 150 years of French "Annales hydrographiques" (Hydrographic Annals) 1848- 1998) (G. BESSERO, J. BOURGOIN and M. LE GOUIC).....	147
- Fifty years ago.....	171
