



C O N T E N T S

17 Feature articles

Gather the best that advanced engineering has to offer: Now of the nuclear energy back-end in Japan

- 17 | Overview (Project outline) MINAMI Kosuke
- 18 | Article1 International collaboration by the civil engineering ISHIKAWA Michio
- 20 | Article2 Approach for decommissioning SATOH Tadamichi
- 24 | Article3 Decommissioning technology and Approach for low-level radioactive waste disposal KARIGOMF Satoshi
- 28 | Article4 Approach for high-level radioactive waste disposal TSUCHI Hiroyuki
 - **32** | Article4 ① Development of controlled drilling technology and measurement method in the borehole KIHO Kenzo
 - 34 | Article4 2 Research and development on groundwater dating HASEGAWA Takuma
 - 36 | Article4 3 Application example of the engineering for underground MATSUI Hiroya
- 38 | Editor's Note MINAMI Kosuke

40 A Special Report on 2011 Great East Japan Earthquake

02 Message from the President

YAMAMOTO Takuro

04 PHOTO REPORTS

- **04** Adjoining shield tunnels and a large-scale underground station, constructed directly beneath railway trucks under small earth covering condition—Grade crossings and elevated lines near Chofu Station, Keio Corporation IWAMURA Tadayuki
- 06 | Doo Expressway: Opening to traffic between Mori Otoshibe MOTOMIYA Tsuyoshi

08 Meet the Expert

Mr. MORI Toshio

10 Admiration of Civil Engineering Heritages by JSCE: Civil Engineering Heritage Sites Selection

No.92 Matsushige Lock Gate: Connecting Old and New Canals in Nagoya HAYASHI Michiko

12 Student Report We did as they did in those days!

No.12 Circulating society with night-soil SAWAMURA Yasuo, YAMASAKI Yukiyo

15 Civil Engineer's Free Time

No.12 A Football Life HASEGAWA Hironobu

69 Topics

Work of civil engineering

SHINOZAKI Masumi

77 My Bookshelf

No.61 YAMADA Minoru

78 Do You Know About Shinkansen?

No.11 Shinkansen operation of East Japan Railway Company KOWADA Akihiro

82 Student Report Learn from the go-getter engineer

No.5 Mr. MATSUMURA Hiroshi SAWAMURA Yasuo, SHINOZAKI Masumi

86 CE Reports

Adjoining shield tunnels and a large-scale underground station, constructed directly beneath railway trucks under small earth covering condition — Grade crossings and elevated lines near Chofu Station, Keio Corporation IWAMURA Tadayuki

96 | CE Careers 101 | JSCE Calendar 108 | This Issue's Contributors