Formation mechanism and burning characteristic of fire whirls
..................................................Futoshi TANAKA, Yoshifumi OHMIYA, Takemasa KOBAYASHI, Naohisa ISHIKAWA
and Ken MATSUYAMA 1

Temperature characteristics of building components heated by radiation panel —Quantification of
thermal control effect to steel plate using water discharge system—
..............................................Yoshifumi OHMIYA, Takemasa KOBAYASHI, Jun-ichi SUZUKI and Hideaki MASUDA 7

Walking sense for aged and adults and dynamic displacement of direct pasted wooden floorings
............................................................Ryota TOMITA and Katsuo INOUE 15

A proposal of the nighttime street lighting utilizing lights from building openings A study at yatsuo
town in toyama city ........................................Masahide KAKUDET, Shigeo KOBAYASHI, Tetsuharu KAIJO and Keisuke IKEDA 23

Study on effect of housing placement on annual space heating and cooling loads of the house —Study
on heat load simulation considering thermal effects of external environment part 2—
..........................................................Yoshihito HIGUCHI, Mitsuhiro UDAGAWA, Makoto SATOH and Ken-ichi KIMURA 31

Control of indoor thermal environment based on the concept of contribution ratio of indoor climate
Part 2 prediction of room air temperature based on cr1 and cr20 ...............................................Taro SASAMOTO, Shinzuke KATO, Shuzo MURAKAMI and Toshiaki OMORI 39

Study on solar transmission performance prediction for windows fitted with voluntary shaped external
louver..................................................................................Junichi KONDO 45

Automatic cartesian grid generation for cfd analysis of wind environment Comparison of error estimation
methods in finite volume cfd analysis part 1 ...........................................Masahiko IMANO, Motoyasu KAMATA and Yuto SAKAMOTO 51

A study on contamination control of dust particles and microbiological particles produced from
the human body ..................................................................................Kozo MASADA, Naoshi KAKITSUBA and Juri TSUESAKI 59

Life cycle cost evaluation for household garbage disposer system
..........................................................Kanako TOYOSADA, Yasutoshi SHIMIZU, Koji KITAGUCHI and Masayuki OTSUWA 67

Calcium and phosphorus behavior in membrane bioreactors that treat domestic wastewater containing
effluent from garbage disposals.........................................................Yoshinori TAKEZAKI and Toshihiro SANKAI 75

Actual condition of air temperature distribution in city and influence of wind upon the relationship
between green coverage ratio and air temperature in summer season —Analysis based on the results
of long-term multi-point measurements for coastal city sendai in tohoku region— Yohsuke JUNIMURA and Hiroaki WATANABE 83

Effects of increased urban temperature on the concentration of photochemical oxidants
...........................................Tsunako NARUMI, Katatsushi SAKAGUCHI, Akira KONDO, Yoshiyuki SHIMODA and Minoru MIZUNO 89

3d-cad modeling of a substantial urban area and heat island potential of urban blocks in summer
Analysis of thermal environment in a substantial urban area with regard to land use and land cover
using numerical simulation part 1 ..................................................Akira HOYANO, Takashi ASAWA, Akinobu MURAKAMI, Rihito SATO and Kanazaki NAKAOHKUBO 97

A study on the indispensable factors in the classrooms through the children's way —Case
studies of the primary and secondary schools established in matsumoto-city— Akiko SHIMIZU and Yoshiharu ASANO 105

Reuse system of building steel structures —Simulation of applying reusable members to new building
steel structures— Masamori FUJITA, Takazo YAMASHITA, Hiroyuki SEKIDO, Yoshiyuki OGAWA and Mamoru IWATA 111