

A generic method to optimize a redundant serial robotic manipulator's structure

Airtightness of residential buildings in Finland

A life cycle assessment of two residential buildings using two different LCA database-software combinations  
Recognizing uniformities and inconsistencies

Analysis of thermo-active pile structures and their performance under groundwater flow conditions

An approach to combining related notifications in large-scale building management systems with a rehabilitation facility case study

Assessing population vulnerability towards summer energy poverty  
Case studies of Madrid and London

Assessing uncertainty in housing stock infiltration rates and associated heat loss  
English and UK case studies

Behaviour of riveted stringer-to-floorbeam connections in cyclic load tests to failure

Briefing  
Initial findings from the urba project

Carbon dioxide permeability of building materials and their impact on bedroom ventilation need

Characterization of elastic constants of anisotropic composites in compression using digital image correlation

Cold-formed RHS T joints with initial geometrical imperfections

Commissioning for nearly zero-energy building projects

Computational design concept analysis  
A Nordic comparison of four apartment buildings

Condensation at the exterior surface of windows

Consideration of energy consumption, energy costs, and space occupancy in Finnish daycare centres and school buildings

Core Project Team As a Management Entity for Construction Projects

Cost optimal and nearly zero (nZEB) energy performance calculations for residential buildings with REHVA definition for nZEB national implementation

Debonding and impact damage in stainless steel fibre metal laminates prior to metal fracture

Designers' performance evaluation in construction projects

Divertor remote handling for DEMO  
Concept design and preliminary FMECA studies

Effect of energy measures on the values of energy efficiency indicators in Finnish daycare and school buildings

Effects of added glazing on Balcony indoor temperatures  
Field measurements

Effects of strain rate and confining pressure on the compressive behavior of Kuru granite

Energy saving and indoor climate effects of an added glazed facade to a brick wall building  
Case study

Energy saving in working hydraulics of long booms in heavy working vehicles

Evaluating retrofit options in a historical city center  
Relevance of bio-based insulation and the need to consider complex urban form in decision-making

Evaluation of thermo-mechanical behaviour of composite energy piles during heating/cooling operations

Experimental study on the behavior of wear resistant steels under high velocity single particle impacts

Financial viability of energy-efficiency measures in a new detached house design in Finland

Heat protective properties of enclosure structure from thin-wall profiles with foamed concrete

Hot-box measurements to investigate the internal convection of highly insulated loose-fill insulation roof structures

Impact of building usage and occupancy on energy consumption in Finnish daycare and school buildings

Impacts of multiple refurbishment strategies on hygrothermal behaviour of basement walls

Implementation of a direct procedure for critical point computations using preconditioned iterative solvers

Improving the thermal performance of concrete-sandwich envelopes in relation to the moisture behaviour of building structures in boreal conditions

Initial axial stiffness of welded RHS T joints

Initial in-plane rotational stiffness of welded RHS T joints with axial force in main member

Instrumentation and fe analysis of a large-span culvert built under a railway, in Finland

Investigating the kinetics and biofuel properties of *Alstonia congensis* and *Ceiba pentandra* via torrefaction

Mapping indoor overheating and air pollution risk modification across Great Britain  
A modelling study

Measured energy consumption of educational buildings in a Finnish city

Modeling of hygrothermal behavior for green facade's concrete wall exposed to nordic climate using artificial intelligence and global sensitivity analysis

Modelling the stressed skin effect by using shell elements with meta-material model

Moment-rotation behavior of welded tubular high strength steel T joint

Multicriteria selection in concept design of a divertor remote maintenance port in the EU DEMO reactor using an AHP participative approach

Output power variation of different PV array configurations during irradiance transitions caused by moving clouds

Overheating in English dwellings  
comparing modelled and monitored large-scale datasets

Parametric study on temperature distribution of square hollow section joints

Passive wireless antenna sensor for strain and crack sensing - Electromagnetic modeling, simulation, and testing

People's current mobility costs and willingness to pay for Mobility as a Service offerings

Precision refurbishment of buildings  
A façade refurbishment case study

Pre-use phase LCA of a multi-story residential building  
Can greenhouse gas emissions be used as a more general environmental performance indicator?

Radon, fungal spores and MVOCs reduction in crawl space house  
A case study and crawl space development by hygrothermal modelling

Recycling lithium mine tailings in the production of low temperature (700–900°C) ceramics  
Effect of ladle slag and sodium compounds on the processing and final properties

Relationships among Civil Engineering Students' Approaches to Learning, Perceptions of the Teaching-Learning Environment, and Study Success

Remote diagnostics application software for remote handling equipment

Role and nature of systemic innovations in construction and real estate sector

Strategy formation in construction firms

Stress relaxation in tempered glass caused by heat soak testing

Stretching risk management standards  
Multi-organizational perspectives

Surrogate modeling for initial rotational stiffness of welded tubular joints

Techno-economic evaluation of integrating torrefaction with anaerobic digestion

The assessment of constructability  
BIM cases

The corrosion rate in reinforced concrete facades exposed to outdoor environment

The effect of matrix type on ageing of thick vinyl ester glass-fibre-reinforced laminates

The effect of steel grade on weight and cost of warren-type welded tubular trusses

The impact of occupancy patterns, occupant-controlled ventilation and shading on indoor overheating risk in domestic environments

The relative importance of input weather data for indoor overheating risk assessment in dwellings

Uncertainty in the early phase of a municipal building refurbishment project-A case study in Finland

Understanding fundamental and practical ingredients of construction project data management

Using probabilistic sampling-based sensitivity analyses for indoor air quality modelling

Utilizing mixed-mineralogy ferroan magnesite tailings as the source of magnesium oxide in magnesium potassium phosphate cement

Utilizing the innovation potential of suppliers in construction projects

Variation of CPTu-based transformation models for undrained shear strength of Finnish clays

Behavior of capacitive humidity sensors in monitoring the drying of concrete walls

Calculation method to determine capillary properties of building materials with automatic free water intake test

Comparison between calculated and billed building energy consumption values of schools and daycare centers

Thermal and moisture properties of calcium silicate insulation boards

Reply to the discussion by koutsoftas on "evaluation of sample quality from different sampling methods in finnish soft sensitive clays"<sup>1</sup>

Editorial to "The best papers from the 32nd International Symposium on Automation and Robotics in Construction and Mining (ISARC 2015)"

Practical experiences from several moisture performance assessments

Two models for hydraulic cylinders in flexible multibody simulations

Acoustics of vanished 19th century concert halls in Helsinki

ÄKK-hankkeen suositukset tulevaisuuden ääneneristysmääräyksiä koskien

Auralization of vanished 19th century concert halls in Helsinki

Julkisivujen ja parvekkeiden talvikorjausohje

Koko Julkisivua peittävän lasijulkisivun vaikutus Etelä-Ruotsissa sijaitsevan rakennuksen energiatehokkuuteen  
Translated title of the contribution: : The impact of the added façade glazing on the building energy consumption in the southern Sweden

Kosteusvaurioiden vakavuus kuntien rakennuksissa

Lasitetun parvekkeen lämpötilan ja lämpöhäviöiden laskenta

Maanvastaisten seinien lämpö- ja kosteustekninen toiminta

Menetelmä parvekelasien ääneneristävyyden mitoittamiseksi liikennemelualueilla

Paine-erot Pirkanmaan ja Helsingin julkisissa palvelurakennuksissa

Puukerrostalon työmaavaiheen lämpö- ja kosteusolosuhteiden mittaukset

Puukerrostalorakentamisen kosteudenhallinta

Puurunkoisten tuuletettujen yläpohjien kosteustekninen toiminta

Puuvälipohjien akustiset ominaisuudet

Raudoitteiden korroosionopeuden määrittäminen betonijulkisivussa korkean aikaresoluution säädätin avulla

Uudessa COMBI-hankkeessa tutkitaan energiatehokkaan palvelurakentamisen haasteita ja ratkaisuja

Alkali-silica reaction in finnish swimming pools

A slotted patch antenna for wireless strain sensing

BIM based schedule control for precast concrete supply chain

Buckling length assessment with finite element approach

Bus Transportation Accessibility - Does It Impact Housing Values?

Crack propagation measurement using a battery-free slotted patch antenna sensor

Fatigue loading tests of concrete railway sleepers

Integration of BIM and automation in high-rise building construction

Passive frequency doubling antenna sensor for wireless strain sensing

Performance of Variable Partial Factor approach in a slope design

Project feedback as a tool for learning

Second-order analysis of prestressed concrete columns

Sensing resolution and measurement range of a passive wireless strain sensor

Shear buckling and resistance of thin-walled steel plate at non-uniform elevated temperatures

Societal impact as Cost-Benefit Analysis  
Comparative analysis of two research infrastructures

Solar Panel Breakage During Heavy Rain Caused by Thermal Stress

Structural analysis of tubular truss in fire

Structural behaviour of long integral abutment bridges

The effect of climate change on the amount of wind driven rain on concrete facades

The target reliability of the eurocodes

Validation of the method to evaluate the corrosion propagation stage by hygrothermal simulation

Wireless crack sensing using an RFID-based folded patch antenna

Betonin kosteustekniset materiaaliominaisuudet ja mittausmenetelmän kehittäminen

COMBI-hankkeen paine-eromittausten yhteenveto

COMBI-hankkeen suositukset korkeatasoisten ja kosteusturvallisten palvelurakennusten toteuttamiseksi - COMBI 8

Huokoisten puukuitu- ja kipsilevytuulensuojalevyjen homehtumisherkyys

Ilmakehän pitkäaalton säteily rakennusfysikaalisissa laskentatarkasteluissa

Kapasitiivisten kosteusantureiden käyttäytyminen betoniseinien ja kipsivalulattioiden kuivumisen seurannassa

Kipsilevytuulensuojallisten puurunkoisten ulkoseinärakenteiden rakennusfysikaalinen toiminta

Koulujen ja päiväkotien sisäilman lämpötilan, suhteellisen kosteuden ja hiilidioksidipitoisuuden mittaukset COMBI-hankkeessa

Puuelementtien välisen sauman tiivistys kumitiivisteellä

Puurunkoisten ulkoseinien liitosten lämpö- ja kosteustekninen toiminta

Rakennuksen ulkovaipan yli vaikuttavien paine-erojen määrittäminen rakennusfysikaalisia laskentatarkasteluja varten

The effect of climate change on freeze-thaw durability of concrete structures in Finland

Eriste- ja levyrappaus 2016, by 57

Julkisivujen ja parvekkeiden talvikorjaus 2018

Liikennetekniikan perusteet  
Opetusmoniste

Tuulettuvat julkisivut 2016, by 64

ÄKK Loppuraportti  
rakennusten ääniolosuhteiden käyttäjälähtöinen kehittäminen

Lähtökohtia tie- ja rataverkon peruspalvelutason määrittämiselle  
Translated title of the contribution: : Basis for defining the basic service level of road and rail network

Pyörävylien tiedot ja laatutaso

WIN-WINTER - Nordic winter road maintenance research program. Preliminary study  
Project report

WIN-WINTER - Tie- ja katuverkon talvihoidon tutkimusohjelma. Esiselvitys  
Raportti tuloksista

Tuulettuvien yläpohjien lämpö- ja kosteustekninen toiminta nykyisessä ja tulevaisuuden ilmastossa

Nano-structured optical fibers made of glass-ceramics, and phase separated and metallic particle-containing glasses

Urban social housing resilience to excess summer heat

