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Kvalifikationer

Byggnadsfysik, Tekn. Dr., Building Physics Tools: Needs, Use and the Lack of Use in the Building Process. Modelling Non-Isothermal Moisture Flow and Frost Penetration, Avdelningen för Byggnadsfysik
2003 jan. 1 → 2009 juni 12
Tilldelningsdatum: 2009 juni 12

Anställning

Adjungerad universitetslektor
Avdelningen för Byggnadsfysik
Lunds universitet
Lund, Sverige
2017 aug. 14 → present

Ledande Teknisk Specialist
NCC AB
Sverige
2010 jan. 1 → present

Forskningsoutput

Airtightness of Nepalese Residential Buildings
Chaulagain, N., Baral, B., Davidsson, H. & Burke, S., 2022 maj 20, I: Periodica Polytechnica Architecture. 53, 1, s. 1-7 7 s.

Probabilistic risk analysis and building performance simulations: Building design optimisation and quantifying stakeholder consequences
Ekström, T., Sundling, R., Burke, S. & Harderup, L. E., 2021 dec. 1, I: Energy and Buildings. 252, 111434.

Evaluating the impact of data quality on the accuracy of the predicted energy performance for a fixed building design using probabilistic energy performance simulations and uncertainty analysis
Ekström, T., Burke, S., Wiktorsson, M., Hassanie, S., Harderup, L.-E. & Arfvidsson, J., 2021 okt. 15, I: Energy and Buildings. 249, 0, 111205.

Mapping of domestic hot water circulation losses in buildings – results from 134 measurements
Burke, S., von Seth, J., Ekström, T., Maljanovski, C. & Wiktorsson, M., 2020, *12th Nordic Symposium on Building Physics (NSB 2020).* 12009. (E3S Web of Conferences; vol. 172).

Proposed method for Probabilistic Energy Simulations for Multifamily Dwellings
Burke, S., Carling, P., Davidsson, H., Davidsson, K., Ekström, T., Harderup, L.-E., Kronvall, J., Sahlin, P., Sundling, R. & Wiktorsson, M., 2020, (Submitted) *12th Nordic Symposium on Building Physics (NSB 2020).* 25011. (E3S Web of Conferences; vol. 172).

Proposed Method for Probabilistic Risk Analysis using Building Performance Simulations and Stochastic Parameters
Ekström, T., Burke, S., Harderup, L.-E. & Arfvidsson, J., 2020, *12th Nordic Symposium on Building Physics (NSB 2020).* Vol. 172. 25005. (E3S Web of Conferences; vol. 172).

A Process for Improved Decision-Support based on Probabilistic Methods for Risk Analysis and Building Energy Performance
Ekström, T., Harderup, L.-E., Arfvidsson, J. & Burke, S., 2019, (Submitted).

Lifecycle profit analysis of prefabricated multi-active façades
Sundling, R., Olander, S., Wallentén, P., Burke, S., Bernardo, R. & Blomsterberg, Å., 2019, I: International Journal of Building Pathology and Adaptation. 37, 5, s. 565-578

Possibilities with Probabilistic Methods for Dynamic Building Energy Simulations using Stochastic Input Data: – Initial Analysis
Ekström, T., Harderup, L.-E., Arfvidsson, J. & Burke, S., 2019, *Proceedings of the Thermal Performance of the Exterior Envelopes of Whole Buildings XIV.* s. 840 849 s.

Method for probabilistic energy calculations: variable parameters
Wiktorsson, M., Burke, S., Kronvall, J. & Sahlin, P., 2017 okt. 17, I: Energy Procedia. 132, s. 3-8 6 s.

Building Physics Tools: Needs, Use and the Lack of Use in the Building Process. Modelling Non-Isothermal Moisture Flow and Frost Penetration
Burke, S., 2009, Byggnadsfysik LTH, Lunds Tekniska Högskola. 218 s.

A New Method of Determining Moisture Flow Coefficients for both Isothermal and Non-isothermal Conditions
Burke, S., Claesson, J. & Arfvidsson, J., 2008, *Proceedings of the 8th Symposium on Building Physics in the Nordic Countries.* Rode, C. (red.). Department of Civil Engineering, Technical University of Denmark, Vol. 2. s. 975-982 8 s.

Crawl spaces in wood framed single family dwellings in Sweden: unwanted yet popular
Burke, S., 2007, I: Structural Survey. 25, 1, s. 51-60

An International Comparative Study Considering Site Production for Sustainable Construction
Gilkinson, N., Persson, M., Ruikar, K., Bagge, H., Burke, S. & Henrich, G., 2006, *[Host publication title missing].* s. 124-125

Decreasing the risk of moisture damage to prefabricated building components - from production to construction
Wihlborg, C. & Burke, S., 2006, *Research in Building Physics and Building Engineering.* Fazio, P., Ge, H., Rao, J. & Desmarais, G. (red.). Taylor & Francis, s. 979-983

Stor risk för fuktskador i fel sorts krypgrund
Burke, S., 2006, Husbyggaren, 48, 1, s. 26-28.

Advantages and risks associated with crawl space foundations
Burke, S., 2005, *[Host publication title missing].* The Icelandic Building Research Institute, Vol. 2. s. 757-764

Är resultatet rimligt? Pedagogiska reflektioner kring LTH studenters förmåga till kritiskt tänkande och rimlighetsbedömningar
Burke, S., Eriksson, E., Modig, G., Sohl, C. & Tufvesson, C., 2005, Project in the pedagogics course "Högskolepedagogisk introduktionskurs".

Tätskikt i våtrum
Arfvidsson, J., Bagge, H., Burke, S., Harderup, L.-E. & Lindstrii, L., 2005, Avdelning för Byggnadsfysik. 89 s.

Analys inför ombyggnad av flerbostadshus i Växjö, in Byggnads- och installationsteknikens utveckling under 1900-talet
Bagge, H., Burke, S., Johansson, D., Kjellsson, E., Lindstrii, L., Olander, S. & Svennberg, K., 2004, Building Physics, LTH, Lund University.

A Swedish Perspective on the Prevention of Moisture Problems During the Building's Design Phase
Burke, S. & Yverås, V., 2004, I: Nordic Journal of Surveying and Real Estate Research. 1, 1, s. 102-113

Determining the Economic Effects of using Building Physics tools during the Building Process
Burke, S., 2003, Byggnadsfysik LTH, Lunds Tekniska Högskola.

Reducing the Risk of Failure in Performance within Buildings
Burke, S., 2003, *Construction Process Improvement.* Atkin, B., Borgbrant, J. & Josephson, P.-E. (red.). Wiley-Blackwell

The Renovation costs of crawlspaces due to moisture damage
Burke, S., 2003, *[Host publication title missing].* Hansson, B. & Landin, A. (red.). Division of Construction Management, Lund Institute of Technology, s. 111-117

Decreasing a Buildings Operational Energy Cosyts through the Application of Building Physics Principles during the Design Phase
Burke, S., Johansson, D. & Öberg, M., 2002.

Examination of operational energy use and physical function utilizing building physics tools, in Energi- och resurshushållning i bebyggelse
Burke, S., Johansson, D. & Öberg, M., 2002, Building Physics, LTH, Lund University.

Projekt

Förstudie av prefabricerade multiaktiva fasadelement för energirenovering av flerbostadshus
Blomsterberg, Å. (PI), Bernardo, R. (Forskare), Gosztonyi, S. (Forskare), Sundling, R. (Forskarstuderande), Olander, S. (Forskare) & Burke, S. (Forskare)
2015/10/01 → 2017/09/30

God luftkvalitet med fokus på trikloramin i energieffektiva badanläggningar
Burke, S. (PI)
AFA Försäkring
2025/08/01 → 2027/08/01

Metodutredning för probabilistiska energiberäkningar och riskhantering
Ekström, T. (Forskarstuderande), Burke, S. (Biträdande handledare), Harderup, L.-E. (Handledare) & Arfvidsson, J. (Biträdande handledare)
2018/09/01 → 2021/09/17