NIT Naval Interior Team - SusFlow

Forum Marinum Turku, 9.6.2025

Kestävyyttä tietovirran ja digitaalisten suunnitteluteknologioiden avulla

Forum Marinum Turku, 9.6.2025

Oy NIT Naval Interior Team Ltd.

- Founded 2000
- Turnkey Design & Build, deliveries for cruise ships, ferries and specialized vessels, including the interiors, background work, insulations, electrical installations, piping and HVAC
- Over 200 000m2 of great spaces delivered to international customers
- ~150 employees + wide network of partners
- Head office in Piikkiö, Finland. Other locations in Turku, Rauma, Wismar, Papenburg, Bremen
- Turnover 52M€ in 2024
- Forecasted turnover 81M€ in 2025

NIT References



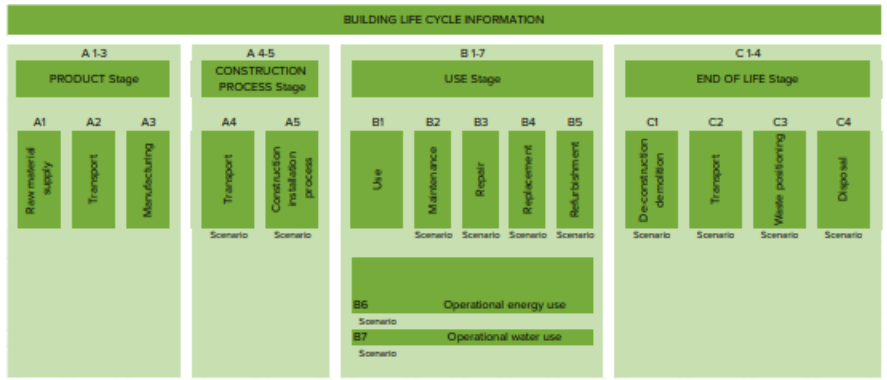


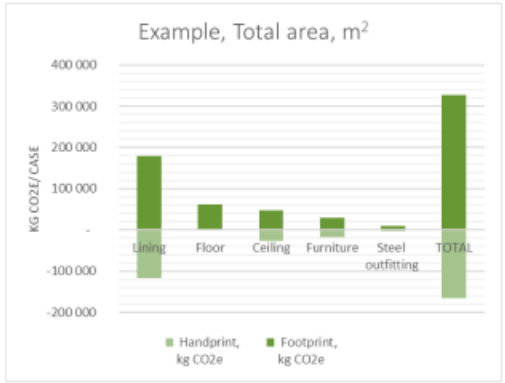


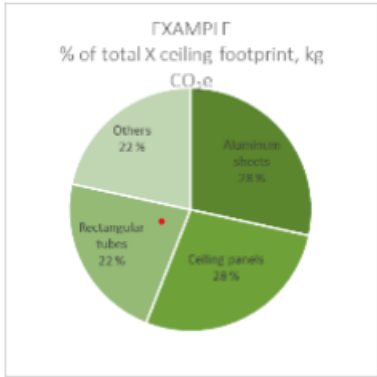
Calculation Method

- Based on EN15804 standard
  - Life-cycle stages A1-A5 raw material to installation
- Carbon Handprint
  - Emission reduction potential in stage D

- Emission factors by individual materials, specified products, and overall volumes
  - Each interior material is examined by the Global Warming Potential (GWP) and results are stated in kg CO_2e

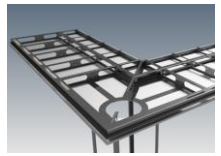




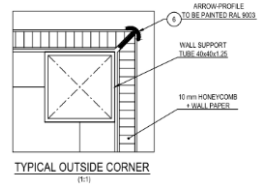


Cruise Ship Design data flow

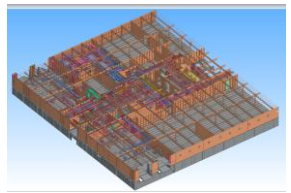
Dassault SolidWorks Parametric stairs design



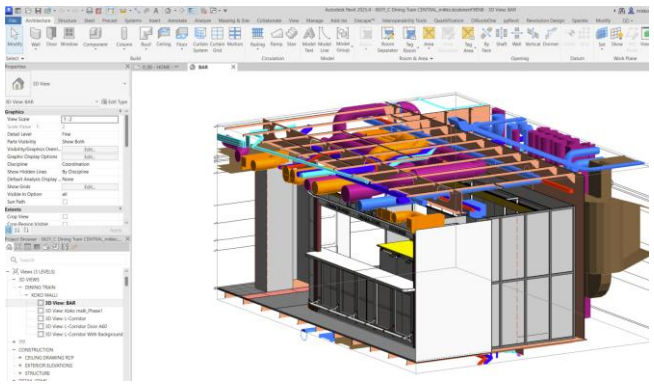
Autodesk Inventor: Pre-fabrication workshop design



Autodesk AutoCad, 2D details



Cadmatic model, Digital Twin?



CRTL Elements: VR software

lemonsoft

ERP System (Lemonsoft)

Detail Design drawings, Part Lists

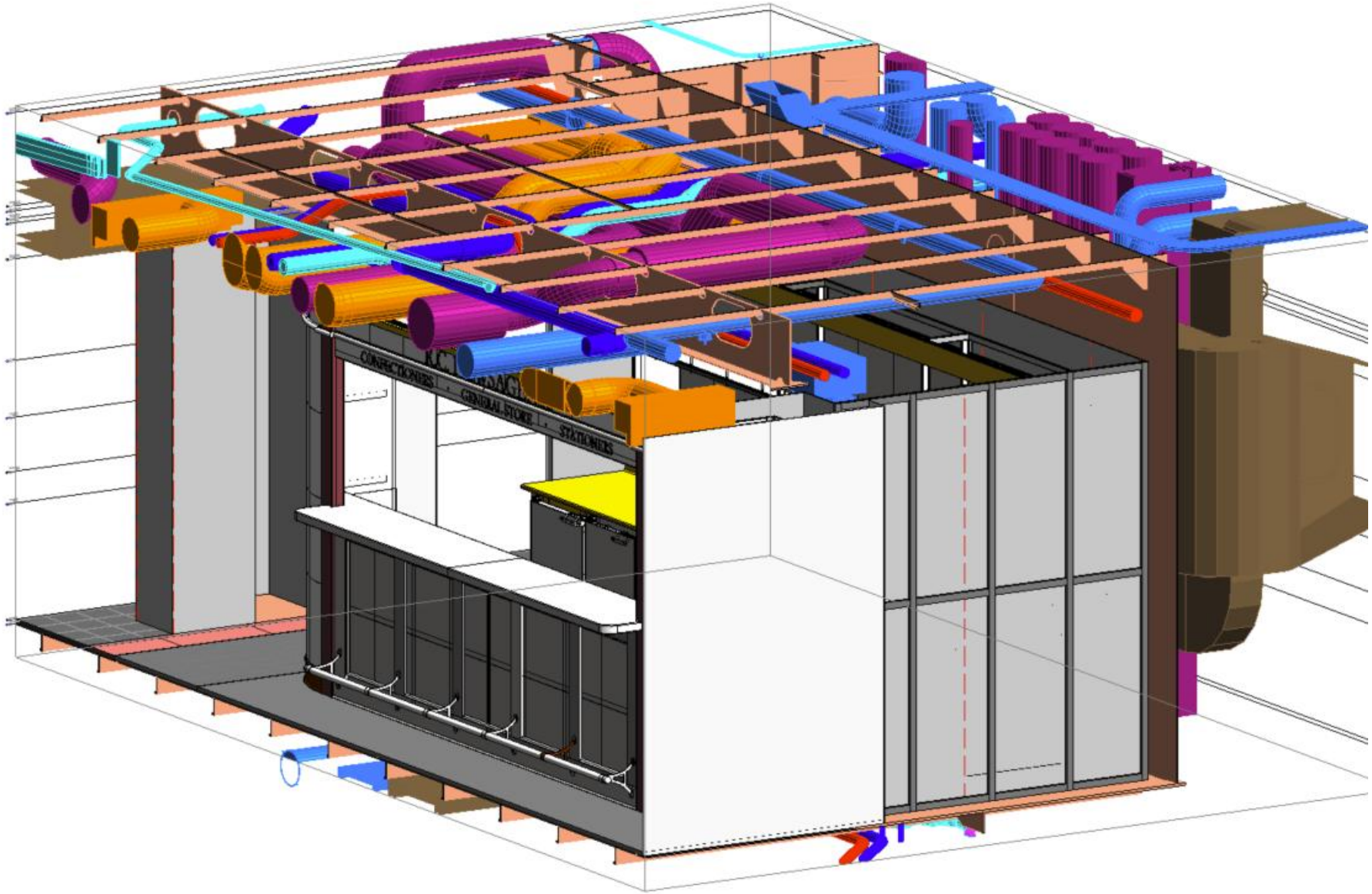
Basic Design drawings, Architect models, Technical documentation

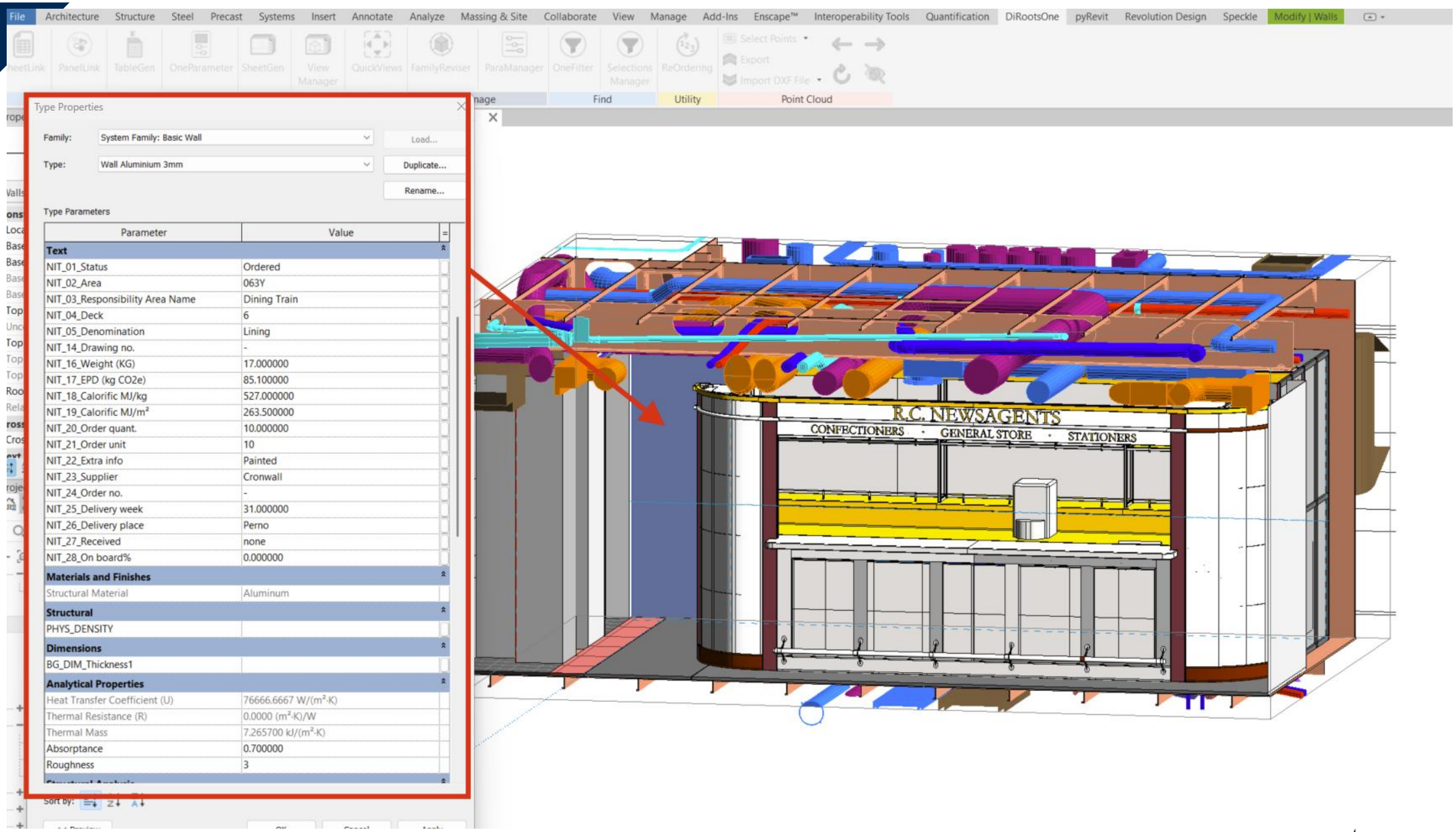
Network of partners:

- Material data
- Certificates
- EPD

MEYER TURKU SHIPYARD 1737

Kronodoc


CORRECTIONERS
GENERAL STORE
STATIONERS


File
Architecture
Structure
Steel
Precast
Systems
Insert
Annotate
Analyze
Massing & Site
Collaborate
View
Manage
Add-Ins
Enscape™
Interoperability Tools
Quantification
DiRootsOne
pyRevit
Revolution Design
Speckle
Modify | Walls
Find
Utility
Point Cloud
Type Properties
Family: System Family: Basic Wall
Load...
Type: Wall Aluminium 3mm
Duplicate...
Rename...
Type Parameters
Parameter
Value
Text
NIT_01_Status
Ordered
NIT_02_Area
063Y
NIT_03_Responsibility Area Name
Dining Train
NIT_04_Deck
6
NIT_05_Denomination
Lining
NIT_14_Drawing no.
-
NIT_16_Weight (KG)
17.000000
NIT_17_EPD (kg CO2e)
85.100000
NIT_18_Calorific MJ/kg
527.000000
NIT_19_Calorific MJ/m²
263.500000
NIT_20_Order quant.
10.000000
NIT_21_Order unit
10
NIT_22_Extra info
Painted
NIT_23_Supplier
Cronwall
NIT_24_Order no.
-
NIT_25_Delivery week
31.000000
NIT_26_Delivery place
Perno
NIT_27_Received
none
NIT_28_On board%
0.000000
Materials and Finishes
Structural Material
Aluminum
Structural
PHYS_DENSITY
Dimensions
BG_DIM_Thickness1
Analytical Properties
Heat Transfer Coefficient (U)
76666.6667 W/(m²·K)
Thermal Resistance (R)
0.0000 (m²·K)/W
Thermal Mass
7.265700 kJ/(m²·K)
Absorptance
0.700000
Roughness
3
Sort by:
R.C. NEWSAGENTS
CONFECTIONERS · GENERAL STORE · STATIONERS

Challenges and further research

1. What and what kind of data is available and how is this implemented in the whole shipbuilding process?
2. What is the sustainability data used for and what do we want to achieve? How is this knowledge turned into competitiveness and added value?

THANK YOU !