STRUCTURAL SOLUTION IN BASEMENT VARIANT A.

COMBINE SYSTEMS.

MAIN BEARING ELEMENTS ARE AS FOLLOW:
- HORIZONTAL ELEMENTS SLABS $h_s = 200\,\text{mm}$
- VERTICAL ELEMENTS COLUMNS WALLS $t = 300\,\text{mm}$
- ROUND WHOLE BUILDING IS REINFORCED CONCRETE WALLS $t = 300\,\text{mm}$
- STAIRCASE IS SUPPORTED BY REINFORCED CONCRETE WALLS $t = 300\,\text{mm}, h = 200\,\text{mm}$

SYSTEM WITH FLAT SLAB

GROUND FLOOR: +/- 0,000 M; +3,100 M

STAIRCASE:
- $h = 1700\,\text{mm}, b = 290\,\text{mm}$
- $L_1 = 1700\,\text{mm}, L_2 = 1500\,\text{mm}$
- $h_f = 3200\,\text{mm}, B = 4000\,\text{mm}$
- SLOPE: max. $30,38^\circ$

STRUCTURAL SOLUTION IN TYPICAL FLOOR OFFICE VARIANT A.

COMBINE SYSTEMS.

MAIN BEARING ELEMENTS ARE AS FOLLOW:
- HORIZONTAL ELEMENTS SLABS $h = 200\,\text{mm}$
- VERTICAL ELEMENTS COLUMNS WALLS $h = 300\,\text{mm}, b = 300\,\text{mm}, T = 300\,\text{mm}$
- ROUND WHOLE BUILDING IS REINFORCED CONCRETE WALLS $t = 300\,\text{mm}$
- STAIRCASE IS SUPPORTED BY REINFORCED CONCRETE WALLS $t = 300\,\text{mm}$

SYSTEM WITH FLAT SLAB

CONSTRUCTION SOLUTIONS:
- MAIN BEARING: REINFORCED CONCRETE, $t = 300\,\text{mm}$, STRENGTH CLASS C 25/30, C 30/37
- HYDRO ISOLATIONS
- RC BEAMS: $h = 500\,\text{mm}, b = 300\,\text{mm}$
- COLONNS: $300 \times 300\,\text{mm}$
- RC SLAB: $h = 200\,\text{mm}$
- RC WALLS: $t = 300\,\text{mm}$
- PARTITIONS: POT 30 drifix; POT 30 aku sym; POT 11,5 profi dryfix
- THERMAL INSULATIONS: ROOF 150 mm - Rockwool Fastrock
- FACADES WALLS: min. $t = 170\,\text{mm}$ - Rockwool Monrock max E
- ELEVATOR: Schindler 3300 FOR MULTIFUNCTIONAL BUILDING - SIZES: 1900 x 1600 mm - 625 kg - 8 PERSONS

STRUCTURAL SOLUTION IN TYPICAL FLOOR PLANS OFFICES: +3,100 M; +6,200 M

TYPICAL FLOOR PLANS OFFICES:
- BASEMENT: +/- 0,000 M; +3,100 M
- GROUND FLOOR: +/- 0,000 M; +3,100 M
- TYPICAL FLOOR OFFICE: +/- 0,000 M; +3,100 M

GENERAL PURPOSE:
Multifunctional building

DEVELOPED BY: Bc.M. Faeyz Yosufi
DREW BY: Bc.M. Faeyz Yosufi
CONSULTANT: Ing. Josef Novák, Ph.D.
CONTROLLED: Ing. Josef Novák, Ph.D.
CUSTOMER: Faculty of Civil Engineering Czech Technical University in Prague