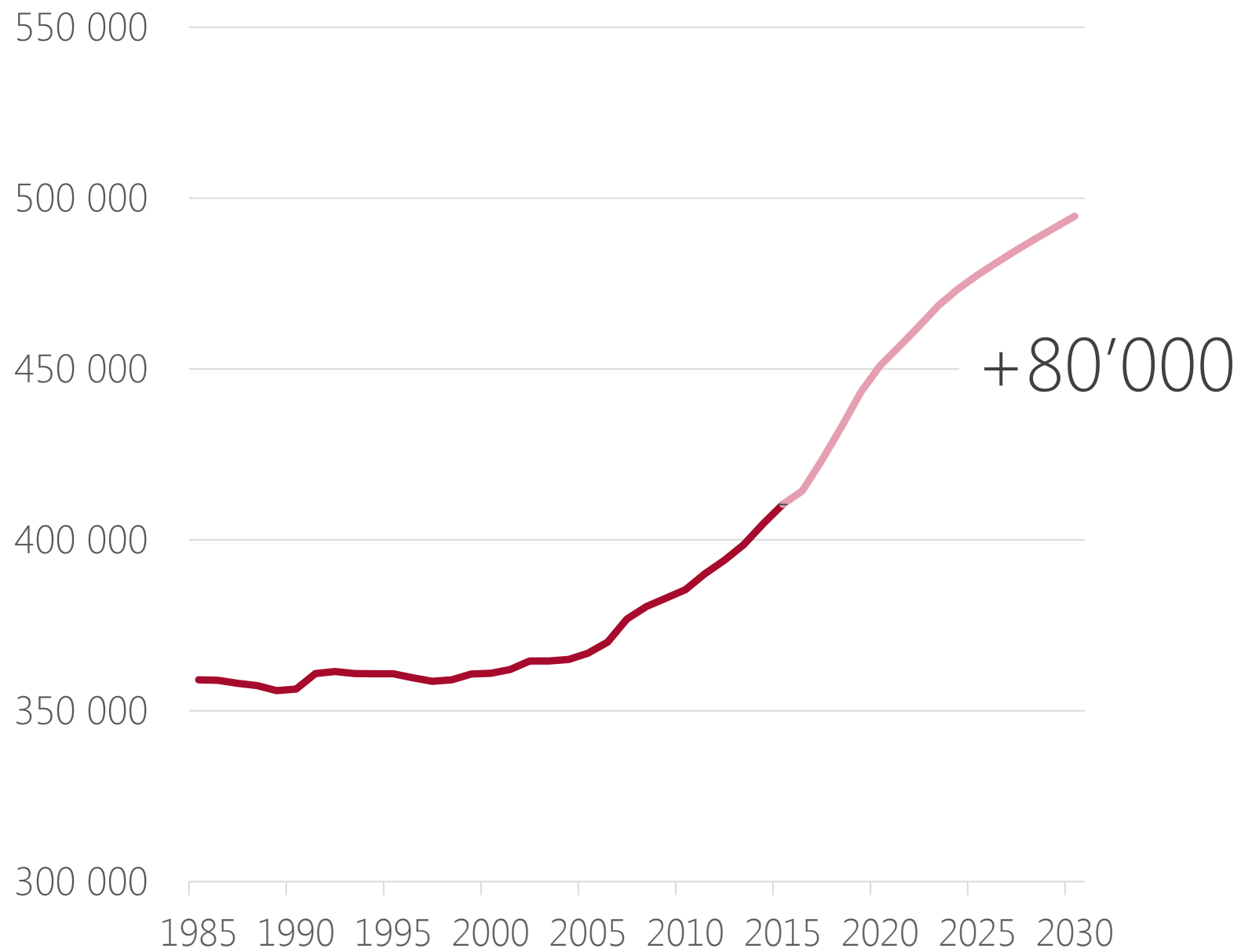


Urbanisme en 3D



Stadt Zürich
Amt für Städtebau

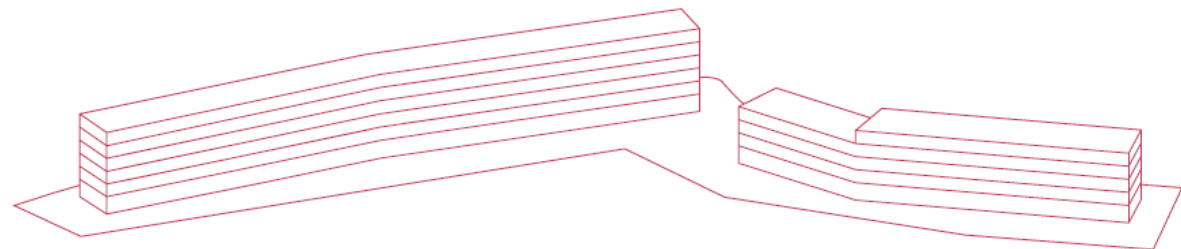
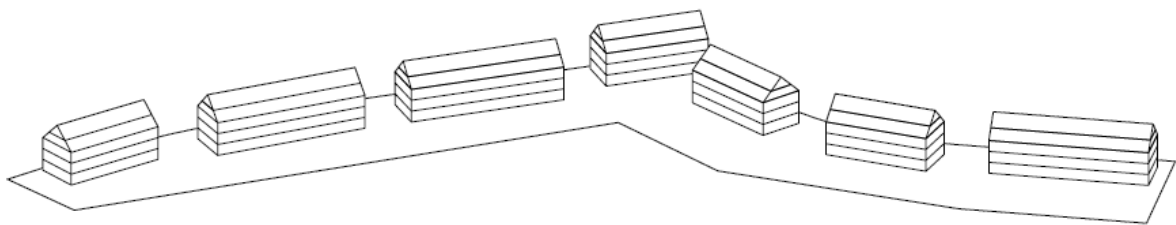
3DGI Conférence 2016
Christian Hürzeler



5 exemples de densification urbaine

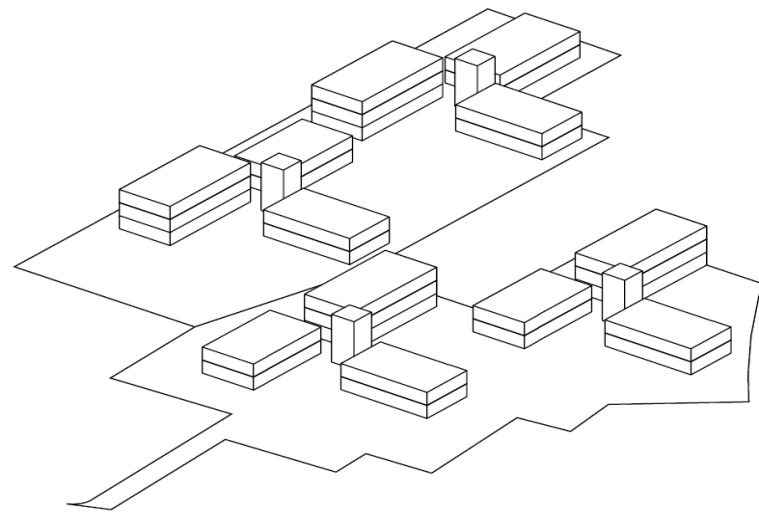
5 étapes pour la ville future en 3D

5 tendances de la géoinformation 3D

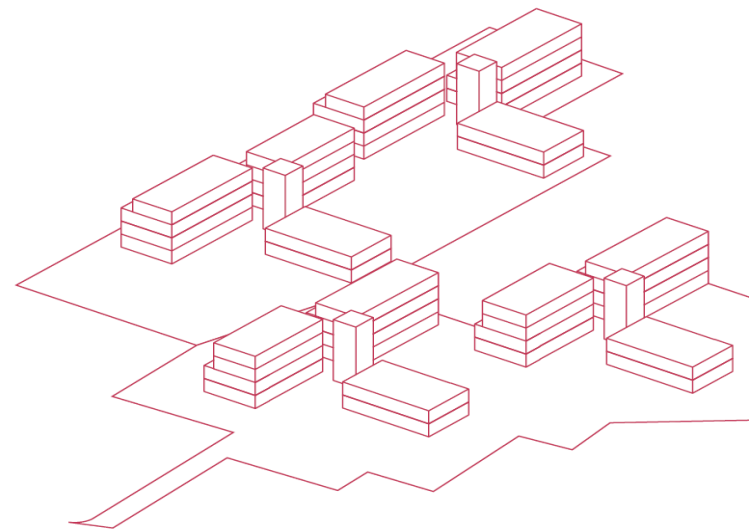


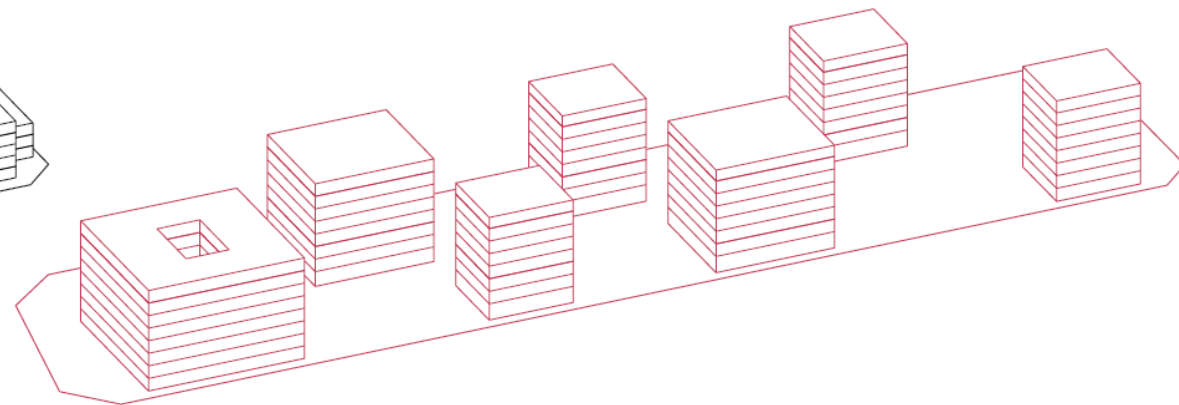
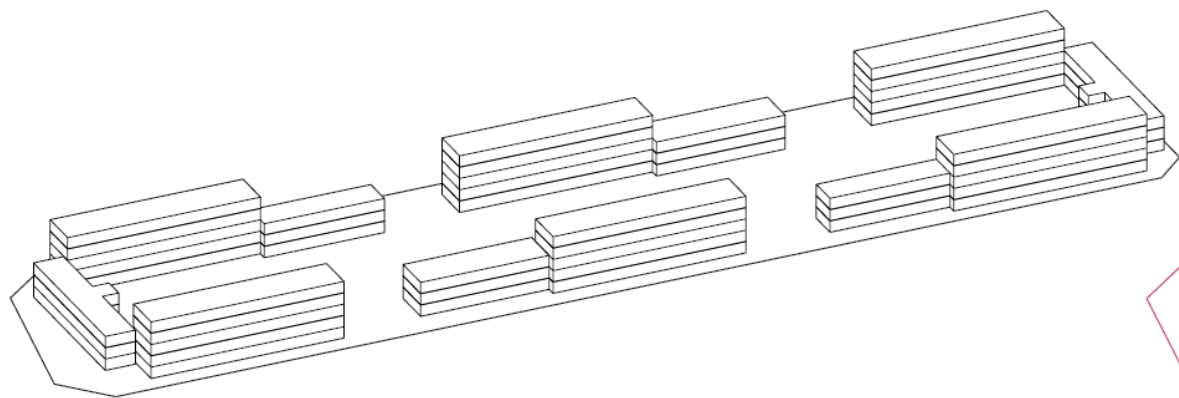
+ 250 habitants





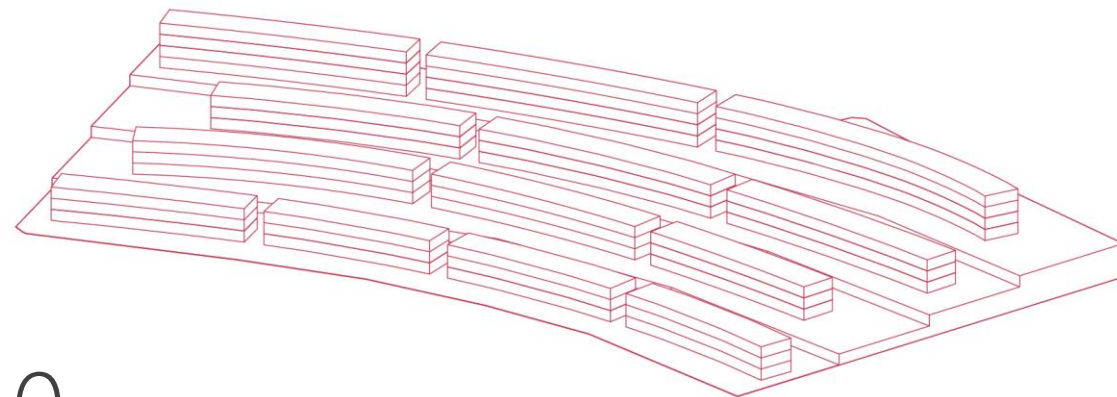
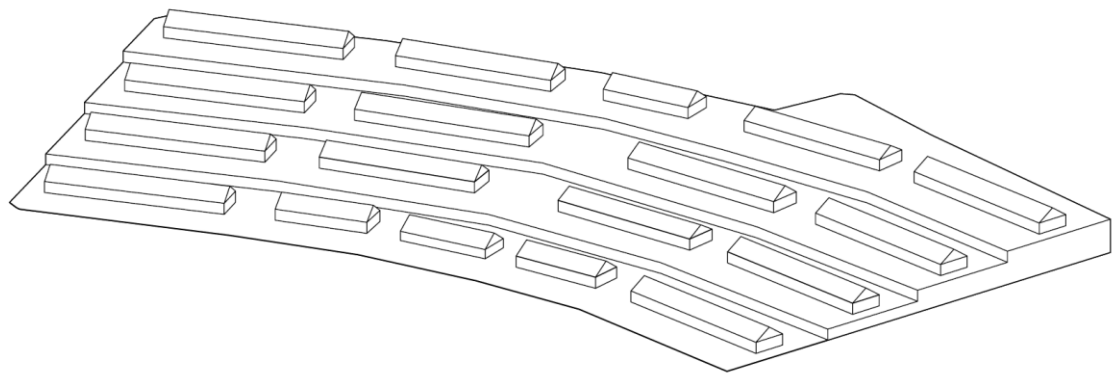
+ 40





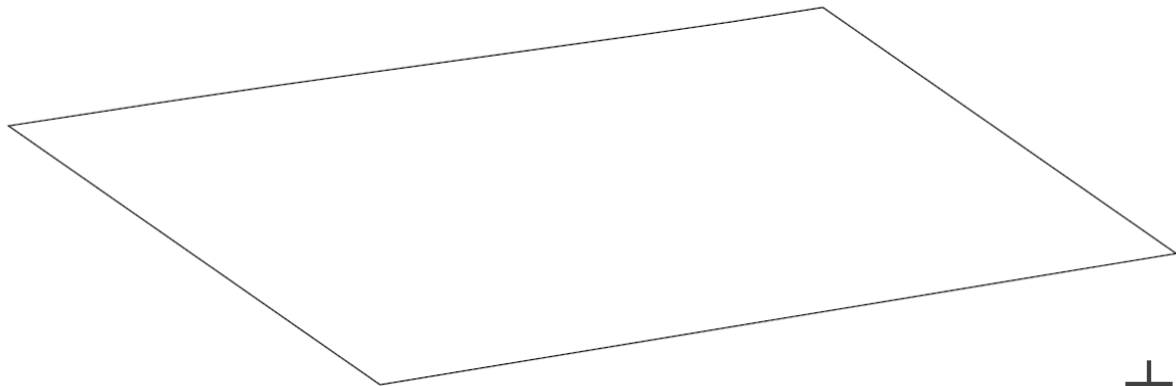
- 120



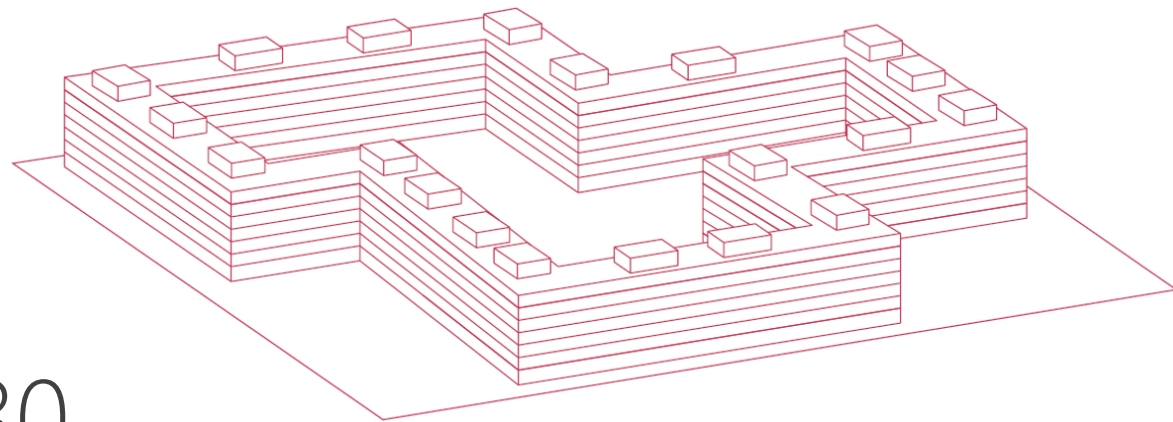


+ 210





+ 980



80'000

-250

-40

+120

-210

-980

78'640

=====

5 exemples de densification urbaine

5 étapes pour la ville future en 3D

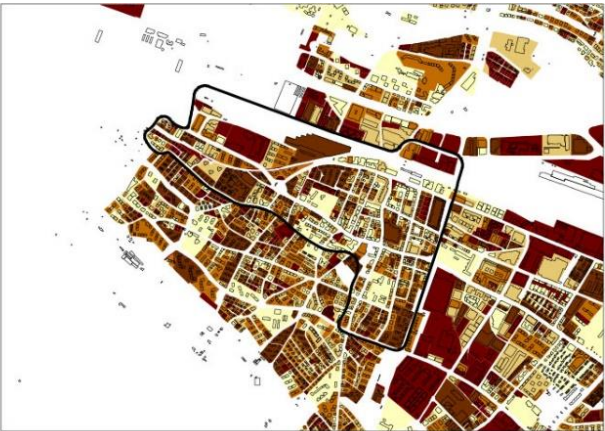
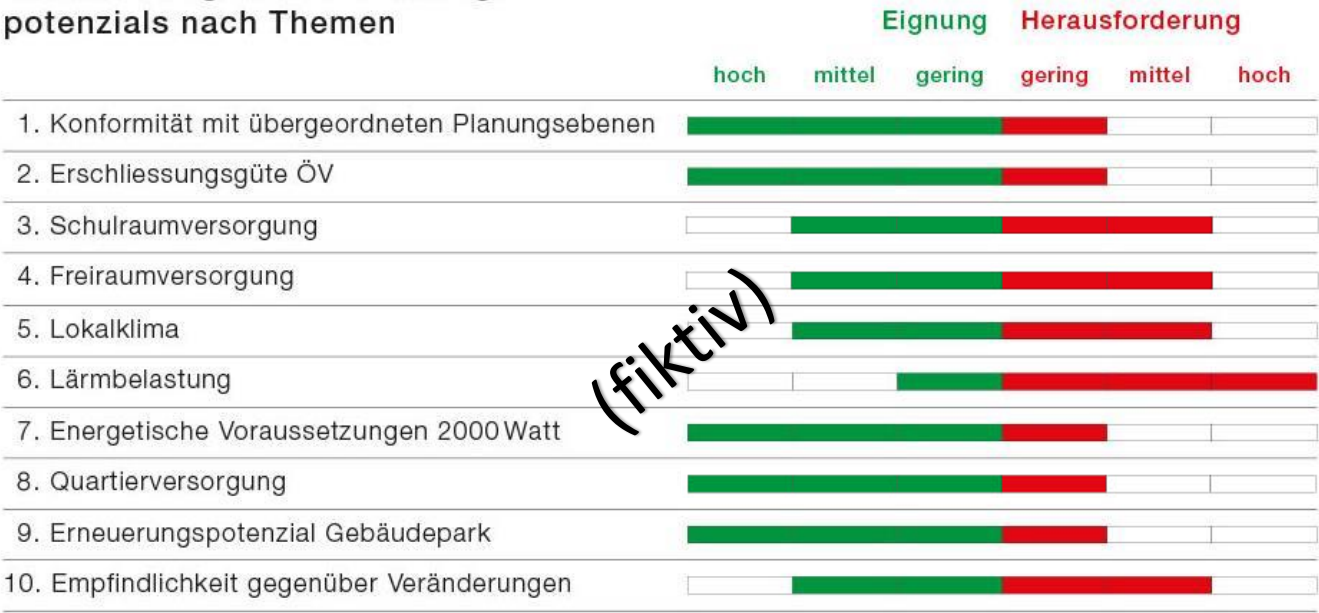
5 tendances de la géoinformation 3D

Étape 1: Analyse

	Perimeter ¹	Gesamtstadt ¹	
Anzahl Einwohner 2014 ²	11'174	404'117	P
Einwohnerdichte Ø	106	85	P/ha
Anzahl Beschäftigte 2013 ³	8'986	453'287	AP
Beschäftigtendichte Ø	86	96	AP/ha
Verhältnis Beschäftigte / Einwohner	45 / 55	53 / 47	%
Geplante zusätzliche Wohneinheiten ⁴	1'224	19'234	WE
Anteil Gemeinnütziger Wohneinheiten	23	21	%
Geschossflächenreserven ⁵	575'367	17'665'275	m2
Inanspruchnahme Reserven bis 2040 ⁶	37	37	%
Bauliche Dichte Bestand	1.08	0.93	AZ
Bauliche mögliche Dichte BZO2014	1.85	1.43	AZ



Einschätzung des Verdichtungspotenzials nach Themen



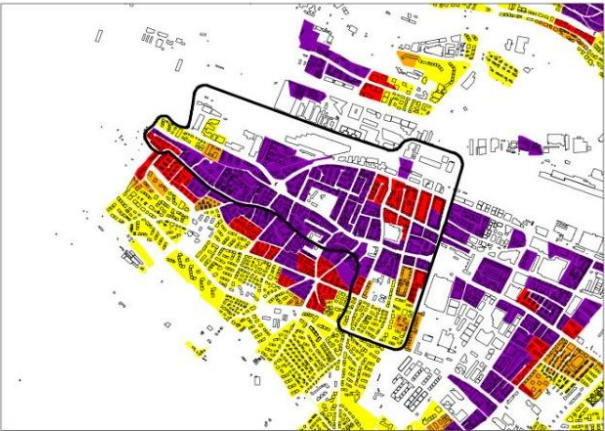
Ausnutzungsreserven BZO2014
(inkl. der Berücksichtigung
der Arealüberbauungen)

keine Reserve
0%–25 %
26%–50 %
51%–75 %
76%–100 %



Eigentümerstruktur

öffentliches Eigentum
Areal über 6000 m² (in Zonen
welche Arealüberbauungen
zulassen, ausschliesslich Oe)
Privateigentum
(1 Farbe pro Eigentümer)



Freiraumversorgung

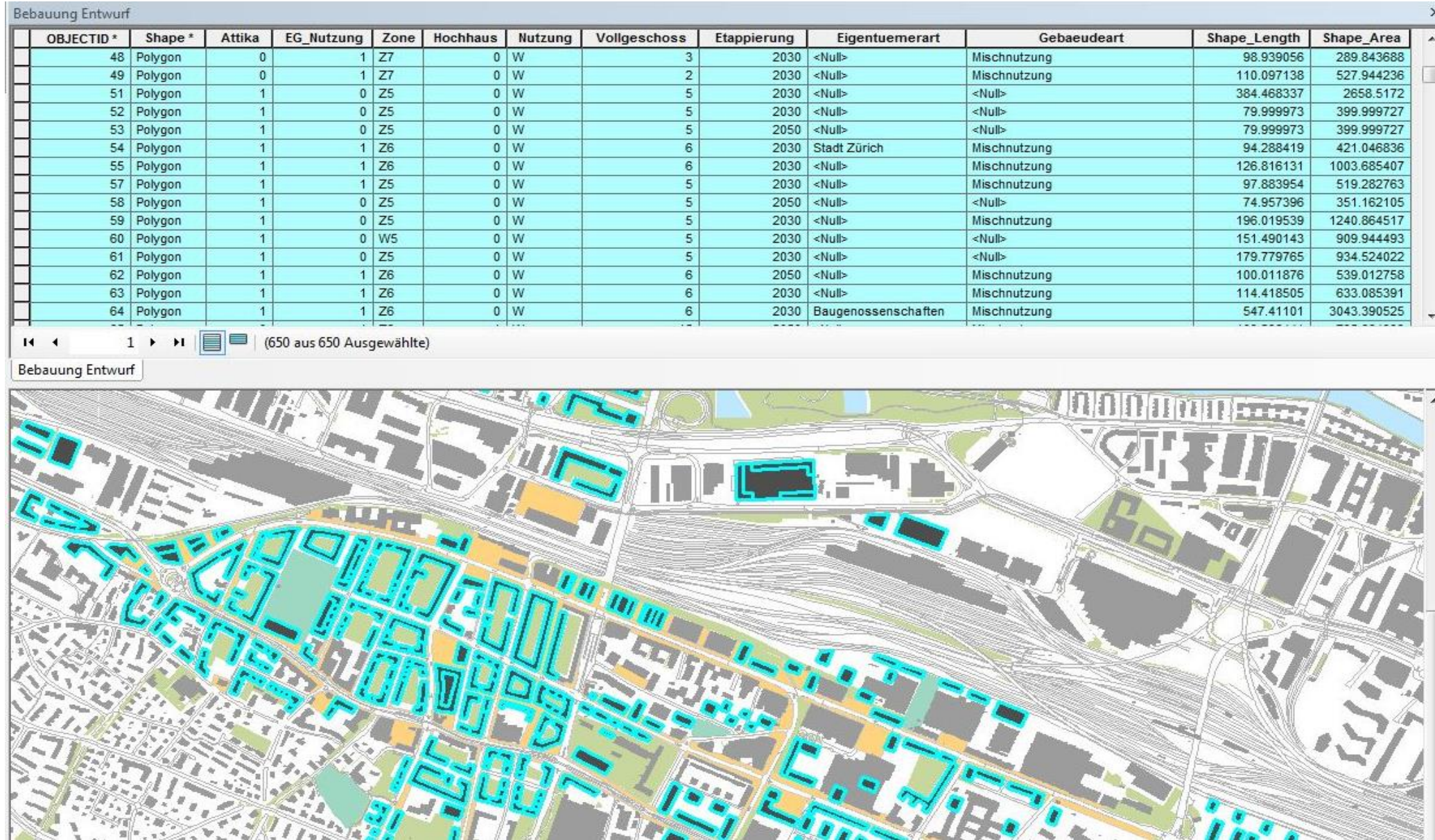
> 75% gut (>6m²)
50%–75% genügend (4-6m²)
25%–50% ungenügend (2-4m²)
< 25% schlecht (<2m²)

M 1:30000
0 375 750 m

Étape 2: Croquis d'idée



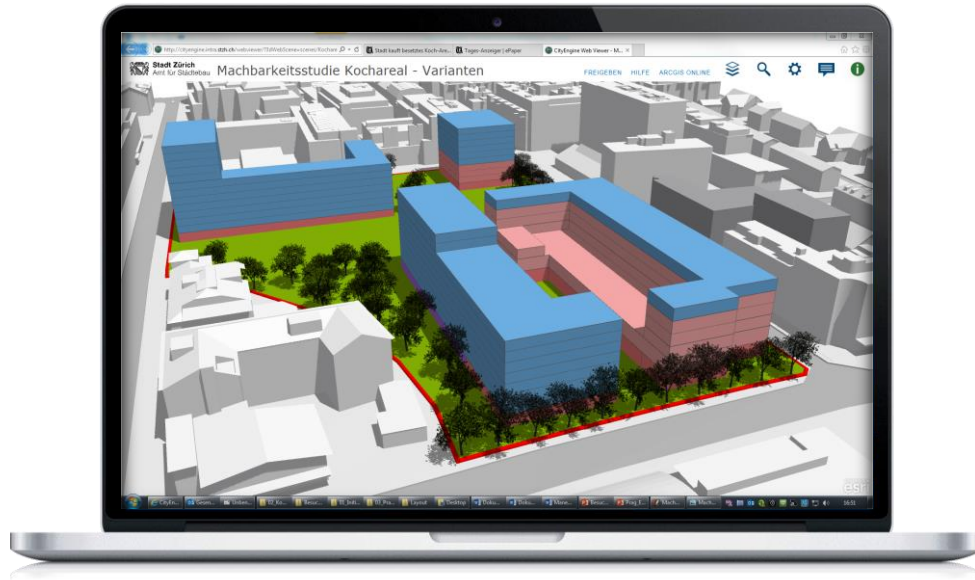
Étape 3: Conception urbanistique en 2D



Étape 4: Scénarios en 3D



Étape 5: Communication

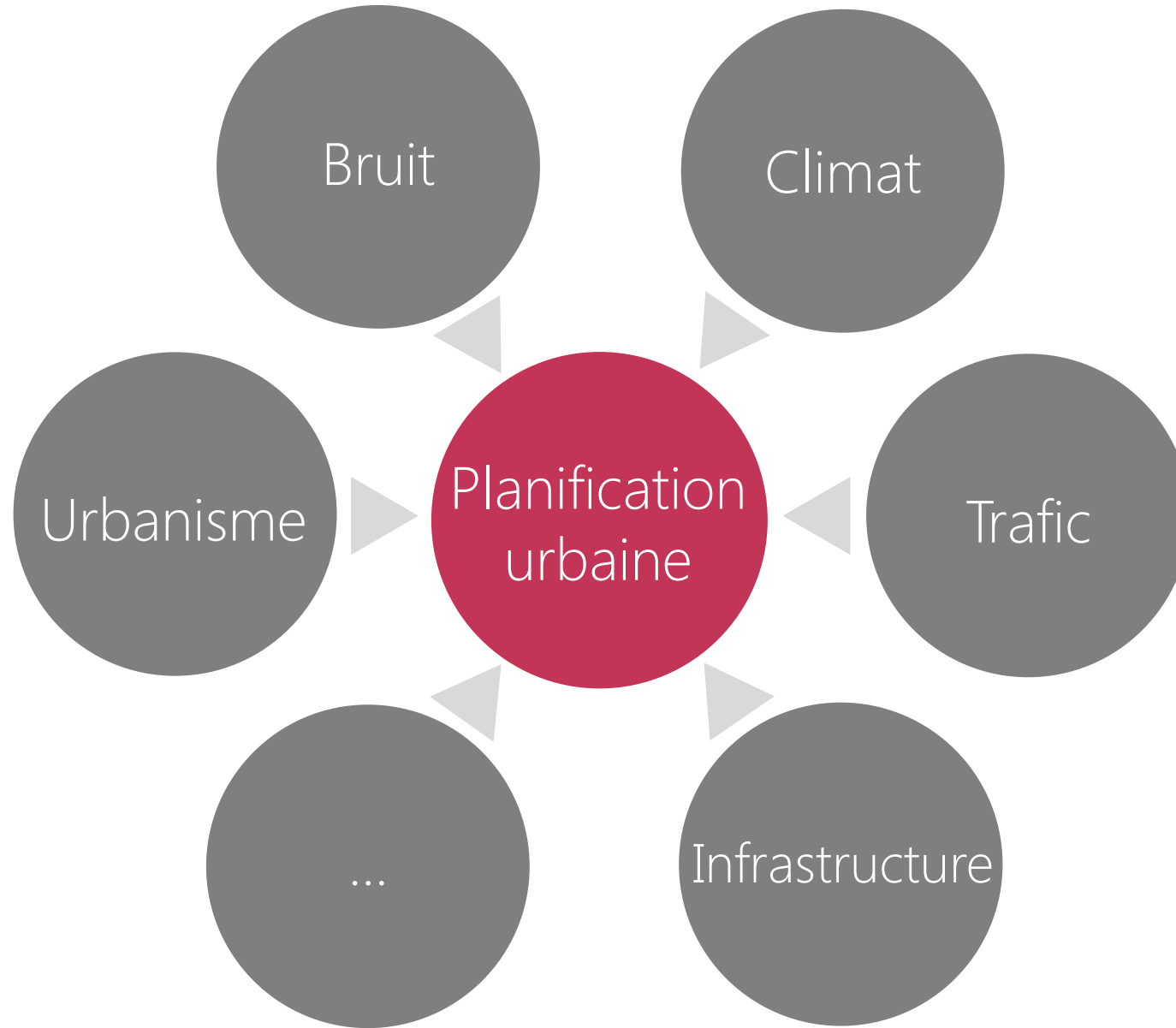


5 exemples de densification urbaine

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Tendance 1: 3D - base pour une planification urbaine intégrée



Centering Tool
Water Shortage Reported



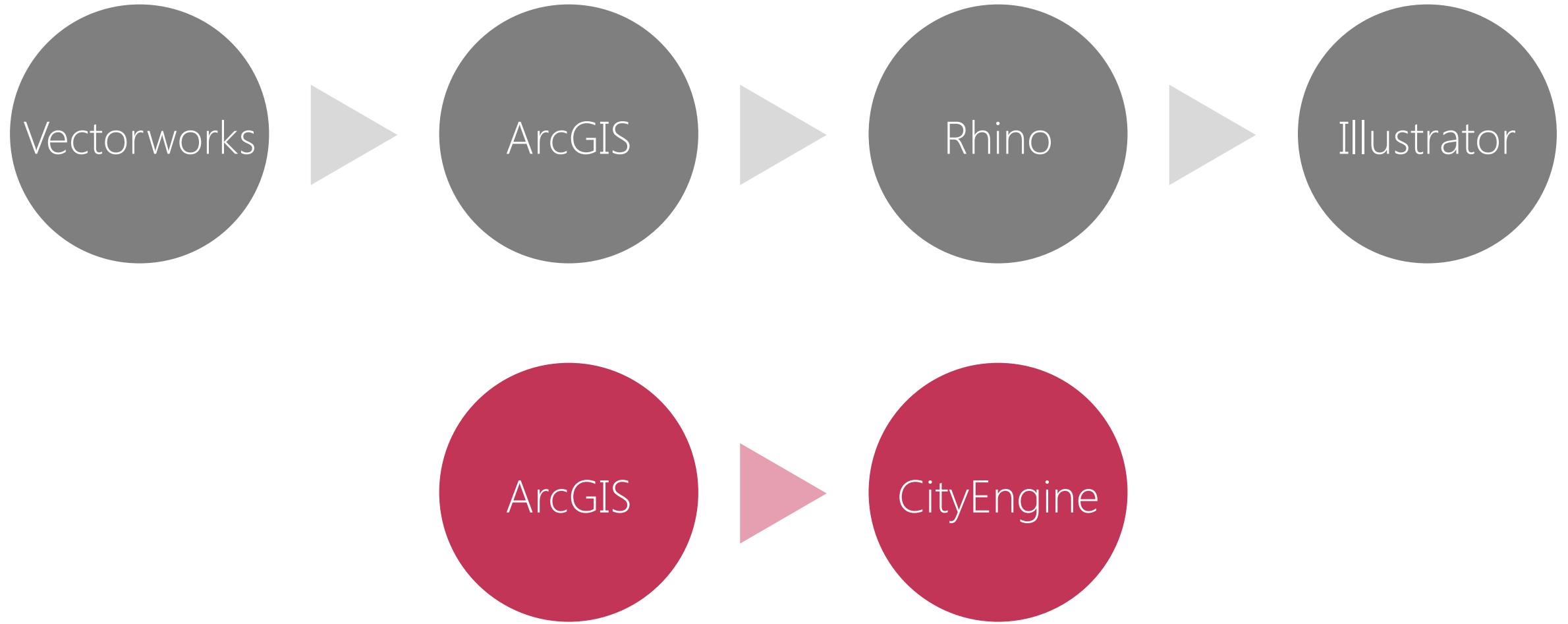
SIM CITY™

START NEW CITY

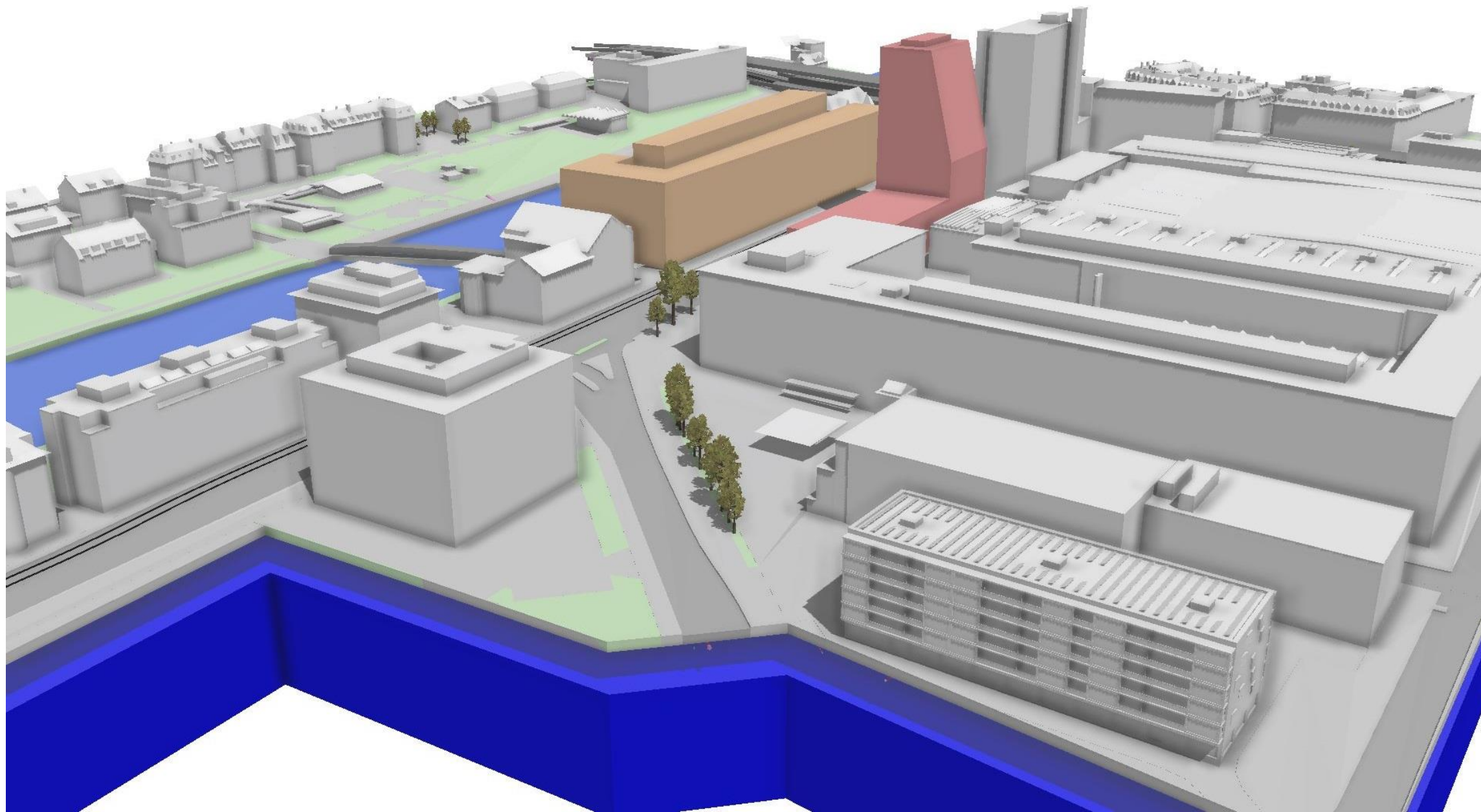
LOAD A CITY

SELECT SCENARIO

Tendance 2: Processus plus facile grâce à SIG 3D



Tendance 3: Données 3D - plus d'objects, plus de détails



Tendance 3: Données 3D - plus d'objects, plus de détails

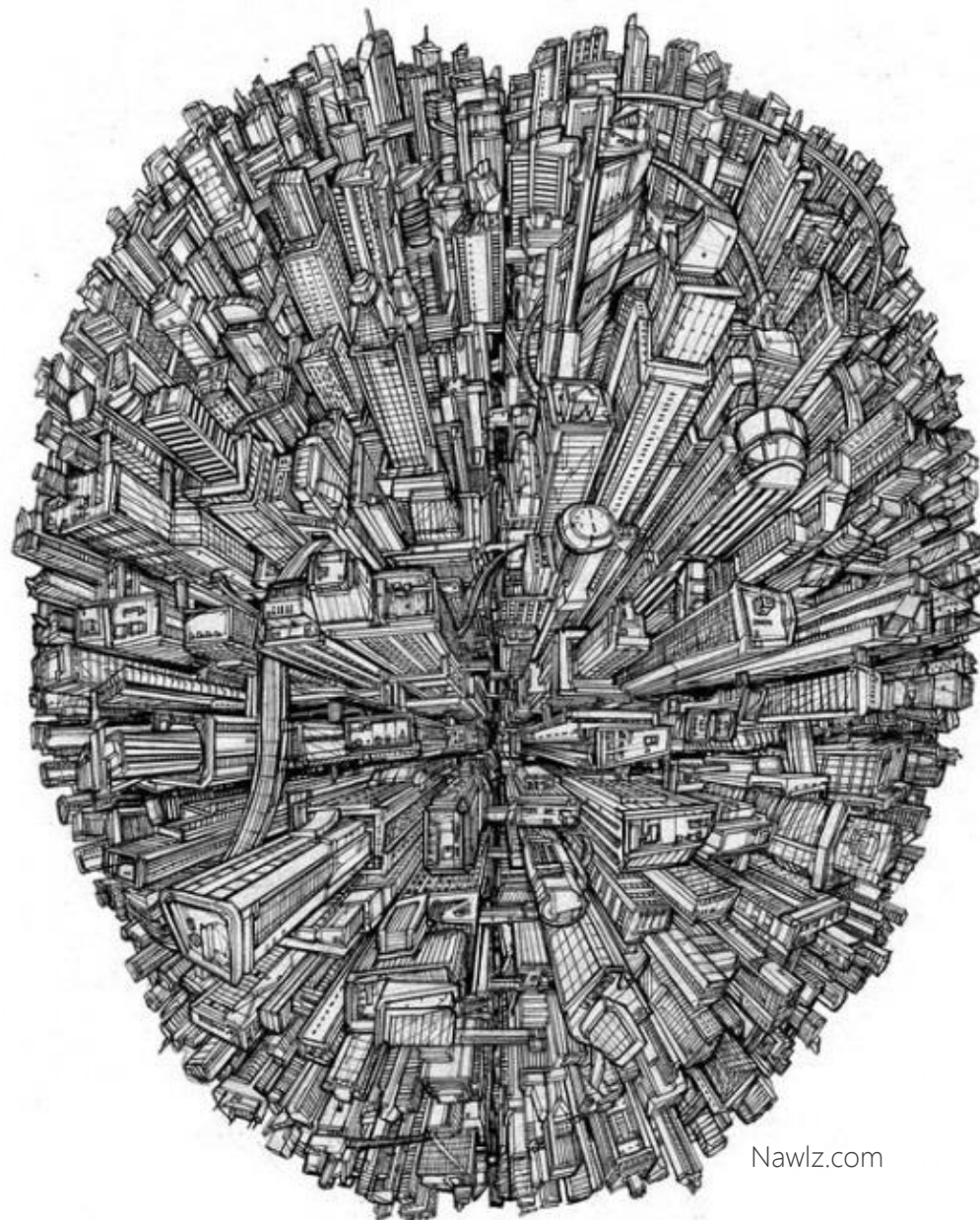


Tendance 4: Technologies 3D en marche avant



Tendance 5: Digitalisation





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