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moscow urban forum

### **MOSCOW URBAN FORUM 2016**

The Age of Megacities: Exploring Global, National and Local Priorities

**30 JUNE - 3 JULY 2016** 











# ISOCARP

Knowledge for better Cities

30 June 2016: Business Program







## ISOCARP Knowledge for better Cities

# **Urban development and planning: Global trends and current practices**



Proposal submitted to the Moscow Urban Forum by International Society of City and Regional Planners (ISOCARP)

### **TERMS OF REFERENCE**

FOR THE **ISOCARP WORKING GROUP** REPORTING TO:

MUF @ MOSCOW, JUNE 2016

ON

"URBAN DEVELOPMENT AND PLANNING IN THE AGE OF MEGACITIES -GLOBAL TRENDS AND CURRENT PRACTICES"

FINAL DRAFT BY: DR DUSHKO BOGUNOVICH AUCKLAND, NEW ZEALAND

18th APRIL, 2016



### SYNTHESIS REPORT BY THE

### ISOCARP STRATEGIC/TECHNICAL ADVISORY TEAM

http://isocarp.org/moscow-urban-forum/

TO THE:
MOSCOW URBAN FORUM
"Fast-Growing Megacities"
30 JUNE - 3 JULY, 2016
http://mosurbanforum.ru
http://mosurbanforum.com

# URBAN DEVELOPMENT AND PLANNING IN THE AGE OF MEGACITIES AN OVERVIEW OF GLOBAL TRENDS AND CURRENT PRACTICES



FINAL SYNTHESIS BY: DR DUSHKO BOGUNOVICH AUCKLAND, NEW ZEALAND 22 JULY, 2016





### SYNTHESIS REPORT BY THE ISOCARP STRATEGIC/TF http://isocarp.org/

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FINAL SY DR DUSHKO AUCKLAND, 22 JU

#### **Contents:**

**Executive Summary** 

- 1. INTRODUCTION: BACKGROUND AND MISSION
- 2. CONTEXT: GLOBAL URBAN TRENDS
- 3. CASE STUDIES: ELEVEN CITIES
- 4. DISCUSSION AND RECOMMENDATIONS

References

Members of the STAT





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#### 4.3. The Key Recommendations

These recommendations refer to the main subjects of this report – mega-projects; mobility strategies; urban metropolitan form; megacities themselves.

Regional Approach – Effective planning for megacities can only take place at the regional scale. Megacities are not just cities - they are also regions. This is why the terms 'urban regions', 'regional cities' and 'city-regions' are ever more in common use. Planning for the full extent of megacities' territorial influence is the only way to maximize benefits and minimize costs – particularly social and environmental. All megacities need metropolitan master plans with explicit, balanced sustainable development goals and a clear spatial strategy. Planning satellite settlements at well-connected locations outside the city proper is an important component of regional urban planning.

<u>Urban Form</u> - The compact city and polycentric development are the key concepts. They are not in contradiction; rather, they are complementary. They cannot eliminate urban spraw, but they can ameliorate its excesses. But <u>urban sprawl</u> will demand more attention in future, and a more tolerant and balance consideration in strategic decisions. We should let sprawl do what it can do well - a house-and-garden lifestyle for those who want it, and a high degree of self-sufficiency which the distributed technologies now make possible, while placing clear restrictions on its ecological performance. Large cities need many centres; hence intensifying selected, well-connected locations makes sense economically, socially and environmentally. Some of these centres should be outside the city proper, as well-connected, but essentially independent satellite towns and villages.

<sup>&</sup>lt;sup>11</sup> The idea is not replicate the UN-Habitat III effort and the coming summit in Quito, in September 2016, expected to adopt the New Urban Agenda, as this is clearly dedicated to all cities, not just megacities: https://www.habibat3.org and is its focus – at this stage - is sustainability, rather than



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2016, expected to adopt the New Urban Agenda, as this is clearly de megacities: https://www.habitat3.org and is its focus - at this stage resilience.





Moscow urban forum

### June 30. Bazhenov hall

### Briefing Research presentations Moscow Urban Forum

12:00 - 12:45

Traditionally, in preparation for Moscow Urban Forum, several research projects are conducted in conjunction with problematics of Moscow as well as with a wider agenda of rapid-growing megacities. Authors of research will present their groundwork, and member of the international expert panel will express their opinion on research.

Список исследований:

- «Города возможностей От Москвы до Сан-Паулу» (PwC)
- «Города, основанные на данных» (PwC)
- «Управление пространственно-экономическим развитием города» (Сколково)
- «Москва: курс на полицентричность» (ВШУ)
- «Конкурентные города» (Всемирный Банк)
- «Городское развитие и планирование: глобальные тренды и актуальные практики» (ISOCARP)
- «Эффект от использования технологии BIM в градостроительстве» (МГСУ и Autodesk)

co-organizer

Department for urban planning policy of Moscow city

moderator

Andrey Sharonov, Dean of MSM Skolkovo\*

speakers

**Dushko Bogunovich**, Associate professor of urban design, Department of Architecture and Landscape Architecture, Unitec Institute of Technology in Auckland, New Zealand **Yelena Korotkova**, Senior Analyst, Center of Urban Competences, MSM Skolkovo

Egor Kotov, research fellow, Higher School of Economics
Dmitry Sivayev, Consultant, World Bank Competitive Cities Program
Austin Kilroy, Senior Economist, World Bank
Yekaterina Shapochka, Head of Practice for Advising State
Authorities, PricewaterhouseCoopers





# URBAN DEVELOPMENT AND PLANNING IN THE AGE OF MEGACITIES

AN OVERVIEW OF GLOBAL TRENDS AND CURRENT PRACTICES



MOSCOW URBAN FORUM 2016

AND
INTERNATIONAL SOCIETY OF CITY AND REGIONAL PLANNERS

## Dushko Bogunovich

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Душко Богунович ИСОКАРП (1983) Професор Урбан Дизайна Юнитек Институт Технологийе Окланд, Нови Зеланд



# ISOCARP research team









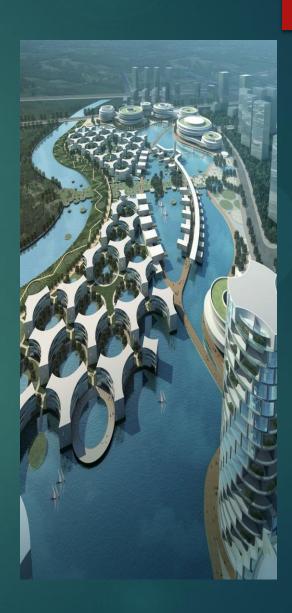


- Dr Dushko Bogunovich (New Zealand)
- Mr Eric Huybrechts (France)
- Ms Taru Jain (India)
- Dr Dorota Kamrowska-Zaluska (Poland)
- Dr Liang Huew Wang (China)



# Contents

- ► THE TEAM
- ► INTRODUCTION
- ► CASE STUDIES
- ► METHODOLOGY
- ► FINDINGS
- ► RECOMMENDATIONS
- ► CONCLUSIONS



# 2. INTRODUCTION



- Dec 2015 MUF and ISOCARP reached agreement: A series of case studies will be produced and then synthesised into a report
- Purpose: global overview of key issues, trends & practices in 'megacities'
- Megacities: mega-problems + mega-impact + mega-investment
- Urban Infrastructure = 'project of the century' (trillions of dollars...)
- Focus: mobility and mega-projects
- Mega-projects: public (infrastructure) and private (real estate)
- Moscow: Moscow-City IBC





- ▶ Business as usual...
- ▶ Will the future tolerate that? Or surprise us with....

# Disruptive events!

- ▶ In two areas:
  - ► Technology (innovation IT, CT, ET, TT, BT)
  - Ecology (global environment)

# technology!



Electric cars racing around the world for 80 days

An international electric car race around the world started on 16 June



New world record set for thin-film solar cells

The performance of thin-filmed solar cells has been further improved to 22.6 per cent

# technology!





24 June 2016

### World's first electric road opens in Sweden

← Europe, Carbon Reduction, Tech. & Innovation, Transport

# Electric cars racing arc world for 80 days

An international electric car race world started on 16 June

Sweden just opened on the E16 in Sandviken a test electric road of two kilometres, which allows electric vehicles to connect to an overhead system similar to light rail.

The country is one of the first in the world to test electric power for heavy transports on public roads, and this initiative will help reach Sweden's target of operating a fossil-free fleet.

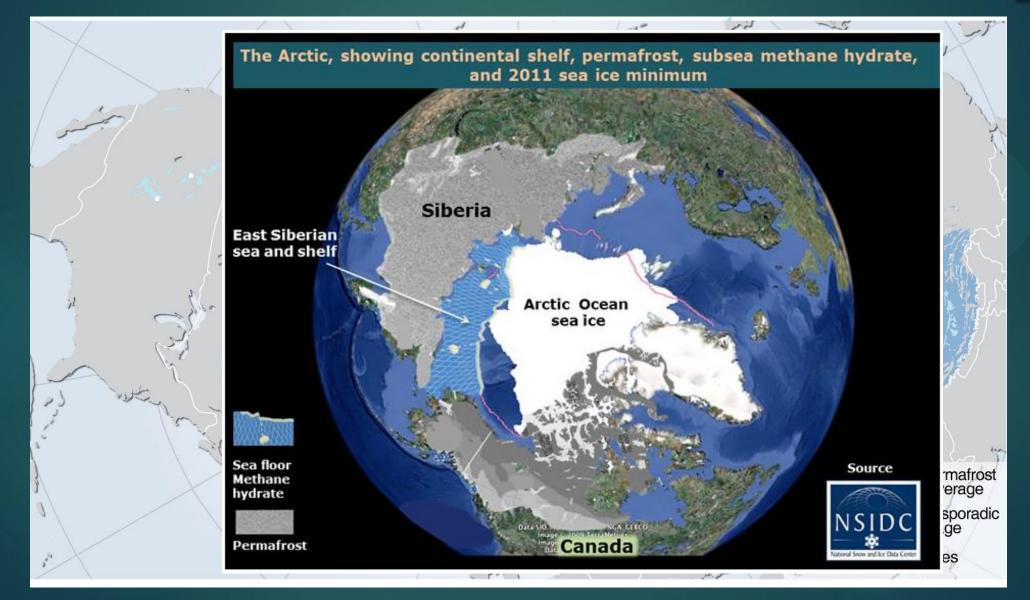
Trucks will run on electric power while they are on the electric road – working in a similar way to a light rail system with a pantograph connecting the truck to the power lines overhead, and operate as hybrid vehicles while on regular roads.



# ecology! (climate change)



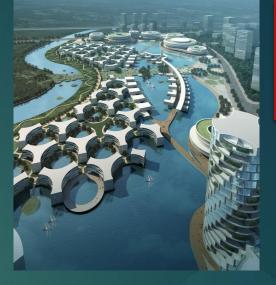
# ecology! (climate change)



We are 16 years now into the 21st century, and there is still too much 20th century thinking in our urban projects!

# 3. CASE STUDIES

- Paris
- Mumbai
- ▶ Hong Kong
- Wuhan
- New York
- Dubai
- ▶ London
- Johannesburg
- ▶ Gdansk/Gdynia
- Buenos Aires
- Auckland



# 4. METHODOLOGY



- ▶ Global sample (11 big cities)
- Case study
- Desk research
- Key informants
- Personal experience

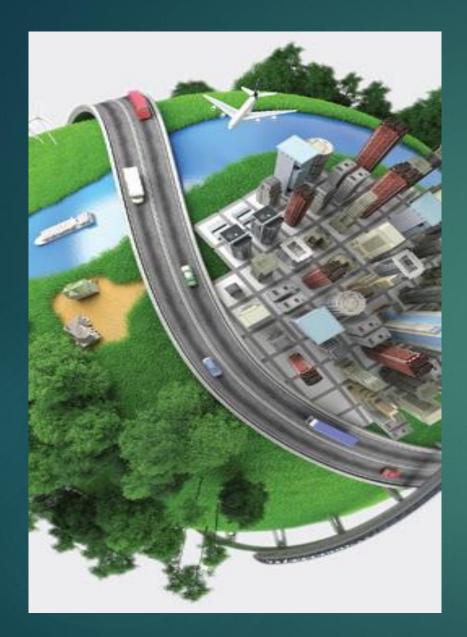
# 5. FINDINGS



- ► GROWTH (demographic + economic + physical)
- ▶ MEGA-PROJECTS (site-specific + city-wide)
- ▶ MOBLITY & URBAN FORM (transport shapes cities!)
- ► INFRASTRUCTURE (more is better!)

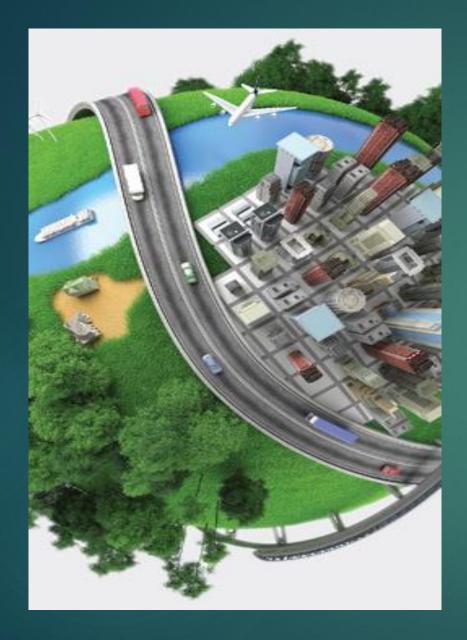


- GROWTH (demographic + economic + physical)
  - ▶ Economic growth dominates the agenda. Environmental and social development agendas are declared as equally important, but in reality, most often are ignored, or given marginal importance.
- MEGA-PROJECTS (site-specific + city-wide)
  - ▶ They are more successful both for the developer and the wider society when they are integrated into, or coordinated with, an overall urban development strategy (such as polycentric development). Strategic master planning is crucial'; context matters.
- MOBLITY & URBAN FORM (transport shapes cities!)
  - Polycentric development and compactness/density continue to be the city authorities' preferred spatial pattern and urban fabric. But, urban sprawl actually dominates the reality.
- INFRASTRUCTURE (more is better!)
  - Whether it only supports private investment and props up economic growth, or improves the environment and quality of life, it always increases the city's ecological footprint.





GOOD PRACTICE?





### **'MATURE' MEGACITIES:**

- prefer intensification and polycentric development, over expansion and monocentric development;
- prefer strategic over ad-hoc planning, and long-term vision over short-term gain;
- are seriously concerned about the environmental impacts of urban growth;
- are using the 'smart city' concept to achieve the 'green&clean' city



# 6. RECOMMENDATIONS



**REGIONAL APPROACH** 

**URBAN FORM** 

REGENERATION

**SUSTAINABILITY** 

RESILIENCE

### REGIONAL APPROACH

Megacities are not just 'cities' – they are also regions. They are' city-regions'.

Planning the full extent of their territorial influence is the only way to maximize benefits are minimize cost and impacts.

### URBAN FORM

Compact urban fabric and polycentric structure are the key, and complementary, spatial concepts. They will never eliminate urban sprawl, but they do have the power to ameliorate its worst excesses (while letting the sprawl do well what it does well – lifestyle, self-sufficiency.... New configurations and technology of infrastructure are part of this urban transformation.

### REGENERATION

Mobilizing poorly used land inside the existing city is the best way to reduce the demand for urban expansion. But these in-the-city opportunities are fraught with obstacles and require rigorous analysis and innovative solutions before qualifying for redevelopment.

### SUSTAINABILITY

▶ Climate change is a serious and present threat. Cities have a triple role in this global drama: they are the main cause; they will be the main victim, and the main potential solution. Megacities have a mega-metabolism – they must make a mega-effort to reduce their consumption.

### RESILIENCE

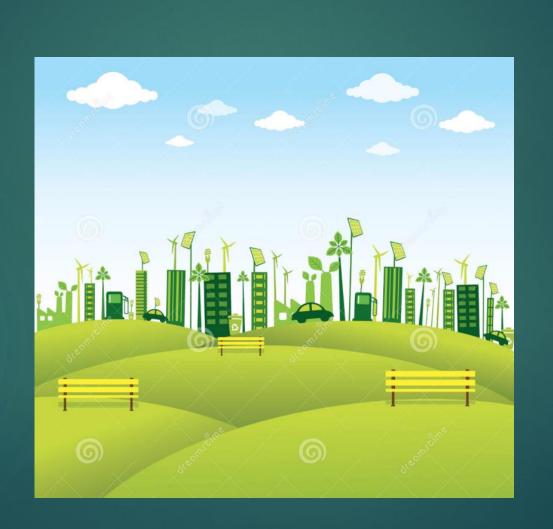
Some climate change is inevitable. Thus mitigation is no more the only agenda - adaptation is necessary too. Cities must improve their resource efficiency, as well as their sufficiency. The concept of resilience may soon become more important than sustainability, with considerable consequence for the planning of urban form and planning and engineering of urban infrastructure.

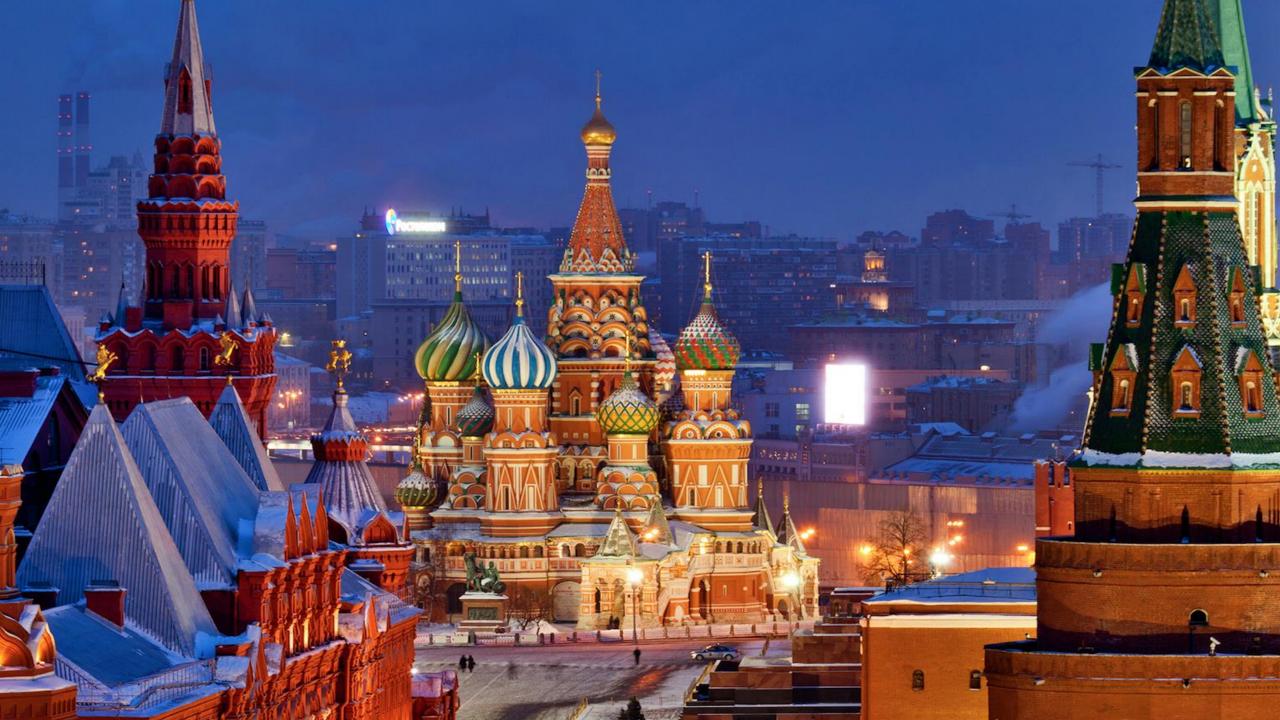
# 7. CONCLUSION



The future of MEGACITIES will be determined by technological innovation and our ecological situation, not by sheer desire for more growth and ever bigger projects. The cities have been the engines of ecological destruction – now they have to become our <u>engines of ecological restoration</u>.

Only the MEGA-PROJECTS which use Smart Technology and Green Technology for the ecological restoration agenda will be successful in the long term. The future of the urban knowledge economy is in 'greennovation – innovation for Urban Ecological Solutions.











# ISOCARP Knowledge for better Cities







20th SEPTEMBER, 2016, NYC