







## 2020 UNIS UN

*Working Paper*

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## A Letter from the Co-Chairs

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Dear Participant,

We'd like to take this moment to thank you for coming to this year's conference, and to introduce ourselves and the rest of the UNIS-UN organizing and executive committees.

The UNIS-UN Conference was founded in 1976 by Ms. Sylvia Gordon, a teacher at the United Nations International School. Her dream was to create an event that would draw attention to the world's most pertinent issues while embodying the values of education and cross-cultural understanding shared by UNIS and the UN. Over the years, UNIS-UN has evolved into the largest student-run conference held in the United Nations General Assembly, with over 500 students attending from six continents.

Each year, the responsibility of carrying on UNIS-UN and the legacy of Ms. Gordon is placed on a group of highly dedicated UNIS students, who have shown responsibility and passion for continuing her efforts. Our planning begins in April by interviewing and selecting students for our Executive Committee. We are then divided into six commissions: Editing, Finance, Logistics, Visiting Schools, Speakers, and Technology. Together, we work with UNIS students making up the Organizing Committee to plan all aspects of the conference, from website design and social media presence to speaker and participant invitations and more.

Over the coming days, you will have the opportunity to listen to, discuss, and debate the most prominent issues in this age of urbanization. As you hear from speakers and debate panelists we hope that you will not only express your own voice, but also carry what you learn and experience here through to your own countries and communities. We've worked hard to plan a marvelous experience for you, and we are excited to welcome you to our city and to the 44th annual UNIS-UN Conference.

*Here's to a wonderful conference!*

Sincerely,

Sophia Duff and Tom Mckillop

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## Foreword

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The global population is expected to increase by two billion over the course of the next 30 years - from the current 7.7 billion to 9.7 billion in 2050 - according to the latest United Nations report. Cities across the world have undergone rapid advancements in infrastructure, transport, housing, social services, and technology to accommodate the sustained increase in population. This has led to the emergence of megacities: large metropolitan areas with a population of more than 10 million people. As of today, there are more than 47 megacities in the world; the largest of which – Tokyo, Shanghai, and Jakarta – support more than 30 million inhabitants.

This working paper seeks to address some of the questions concerning the continued development of megacities, and consider both the benefits and detriments of urban agglomerations. It is our hope that the following articles and info-graphics will allow you to think objectively about urbanization and development in modern cities, form ideas on sustainable solutions to the outlined issues, and understand the many ways in which megacities increase the quality of life of their inhabitants. As you hear from speakers and debate panelists, this information is at your disposal for contribution to the discussion.

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## Debate Motion I

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*‘Using AI and face-recognition in cities is an unacceptable invasion of privacy.’*

In debating this statement, we encourage students to consider data collection. Face-recognition technology allows authorities to trace the movement of all people at all times, including whom they meet and where. Is this desirable? To what extent do governments have the right to store data on citizens? Should they be able to access this information all of the time? Only in the case of an investigation? Is constant surveillance, even of persons who pose no threat, necessary for our security? These are some of the questions we hope will be addressed when arguing for or against this motion.

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## Debate Motion II

***‘All private transport in cities should be banned.’***

In debating this statement, we would like for you to consider the benefits and disadvantages of both private and public transport. To what extent are private transportation vehicles such as helicopters and car services the main source of pollution in cities? Are they responsible for the majority of traffic congestion in cities? Are public transportation vehicles such as buses and trains accessible to everyone? Can private transport provide the same service more efficiently? How would urban planning be impacted by a ban on private transportation services? These examples are some we hope you will address while preparing for the debate.



## POLITICAL DIVIDE by Natasha Guarda

*“In other words, those living in urban areas are not rooted in a homogenous tradition as those living in rural regions tend to be.”*

## NOTES:

1. Maxwell, Rahsaan. “Analysis | Why Are Urban and Rural Areas so Politically Divided?” The Washington Post, WP Company, 5 Mar. 2019, [www.washingtonpost.com/politics/2019/03/05/why-are-urban-rural-areas-so-politically-divided/](https://www.washingtonpost.com/politics/2019/03/05/why-are-urban-rural-areas-so-politically-divided/).

2. Guarino, Ben. “Long before Brexit, Geologic Catastrophes Split Britain from Europe.” The Washington Post, WP Company, 7 Apr. 2017, <https://www.washingtonpost.com/news/worldviews/wp/2016/06/24/britains-striking-geographical-divide-older-brexit/>.

3. Lichfield, John. “Just Who Are the Gilets Jaunes?” The Guardian, Guardian News and Media, 9 Feb. 2019, <https://www.theguardian.com/world/2019/feb/09/who-really-are-the-gilets-jaunes>.

4. Brownstein, Ronald. “How the Election Revealed the Divide Between City and Country.” The Atlantic, Atlantic Media Company, 21 Nov. 2016, <https://www.theatlantic.com/politics/archive/2016/11/clinton-trump-city-country-divide/507902/>.

In recent years, the chasm dividing the left from the right has shown to be a divide of urban and rural areas as well. This trend has global implications. In the United States 2018 midterm election, Republicans won 87% of rural congressional districts, while the Democrats beat the GOP in the majority of rural districts.<sup>1</sup> Similarly, those against British exit from the European Union in the United Kingdom are concentrated largely in such urban areas as Cardiff, Glasgow, and London, while the population in favor of Brexit lives predominantly in rural regions.<sup>2</sup> France’s Gilets Jaunes movement protests President Macron’s policies which they allege favor well-off urbanites at the cost of less wealthy rural residents.<sup>3</sup>

The stark divide between rural and urban areas and their respective political leanings can be accredited to various causes. It can be asserted that urban areas attract people from a myriad of backgrounds, including those who have immigrated from various nations.<sup>4</sup> With them, people who move to these urban areas bring their own culture, shaped by factors such as religion, experience, and history. In other words, those living in urban areas are not rooted in a homogenous tradition as those living in rural regions tend to be. As such, it can be argued that because of the various demographics living in cities, urban areas tend to promote liberal ideologies.

It has also been suggested that there is a relation between employment opportunities in rural and urban areas. Employment opportunities in rural areas typically require vocational training. Contrastingly, there are more higher paying jobs available in urban areas than in rural areas which require more specialized tertiary education. As trade increases with countries that are able to produce goods more efficiently, it is



those employed in jobs that require less formal education found in rural areas that are hurt the most. In the case of the United States, these rural workers who have felt left behind by the movement of their employment abroad have begun to vote in favor of the right. Some would argue that the left tends to represent ideas of the establishment; the policies seem to favor the elite as opposed to work in support of rural workers. Consequently, rural residents tend to vote in favor of the GOP in hopes of closing the gap between the employment rates of rural and urban areas.<sup>5</sup>

The extent to which politics will be influenced as cities across the globe grow in both size and population remains a question. Based on trends in urban and rural areas, rapidly growing cities should hypothetically become increasingly left-leaning. Yet trends suggest otherwise. São Paulo, for example, experienced a population growth rate of about 1.3% from 2010 until 2018, compared to the global average of 0.7% in cities.<sup>6</sup> In the 2010, 2014, and 2018 Brazilian general elections, São Paulo consistently voted for the right-leaning candidate.<sup>7</sup> Similarly, Midland, Texas has experienced a growth rate of 4.3% from 2016 until 2018 due to increased job opportunities.<sup>8</sup> Though the city has grown substantially since 2010, the state has voted consistently for the right in both the presidential and house elections since.<sup>9</sup>

The political divide across the world appears to be one shaped by geography as well. The causes of this divide vary, but appear to be produced especially by opportunity, education, and employment available in a given region.

## NOTES:

5. "Rural Employment and Unemployment." USDA ERS - Rural Employment and Unemployment, <https://www.ers.usda.gov/topics/rural-economy-population/employment-education/rural-employment>

6. "Sao Paulo, Brazil Population." World Population Statistics, [populationstat.com/brazil/sao-paulo](https://populationstat.com/brazil/sao-paulo). <https://populationstat.com/brazil/sao-paulo>

7. *Divulgação De Candidaturas e Contas Eleitorais*, <http://divulgacandcontas.tse.jus.br/divulga/#/>

8. "The Fastest-Growing Cities in America." U.S. News & World Report, U.S. News & World Report, [www.usnews.com/news/cities/slideshows/new-census-estimates-reveal-the-fastest-growing-cities-in-america?slide=11](https://www.usnews.com/news/cities/slideshows/new-census-estimates-reveal-the-fastest-growing-cities-in-america?slide=11). new-census-estimates-reveal-the-fastest-growing-cities-in-america?slide=11

9. "Texas Election Results 2016." The New York Times, The New York Times, <https://www.nytimes.com/elections/results/texas>

## SEGREGATION WITHIN CITIES by Lara Popovic

*“Segregation is a current global issue that has been difficult to find a solution to. Finding a solution would mean a smaller separation between rich and poor, the integration of different ethnicities within communities, and the desegregation of schools.”*

Both racial and economic segregation are apparent in cities all around the world. The separation between rich and poor is drastic and a clear global issue. It is visible in every city in the United States. Even if the city councils and mayors try to eliminate it, there are clear distinctions that indicate the differences between various neighborhoods within cities. With segregation, there is a difference in opportunity and access. Those who grow up in wealthier neighborhoods will most likely attend a private school or high performing public schools and graduate from college. The chances of success for those growing up in poorer neighborhoods with not as high performing public schools are much less. In 2010, 4.1% of majority-white communities were acknowledged as high poverty neighborhoods in the United States, whereas 6.1% were majority Asian, 30% were majority Hispanic, and 43% majority African American.<sup>10</sup> This means that Black and Hispanic citizens are more commonly recognized to be living in impoverished neighborhoods, far more than the U.S. White and Asian population.

## NOTES:

10. Ellen, Ingrid Gould. “4 Ways to Tackle Segregated Cities, and Why It Matters.” Living Cities, [www.livingcities.org/blog/1279-4-ways-to-tackle-segregated-cities-and-why-it-matters](http://www.livingcities.org/blog/1279-4-ways-to-tackle-segregated-cities-and-why-it-matters). Accessed 24 Dec. 2019.

11. Geoghegan, Peter. “Which is the world’s most segregated city?” The Guardian. The Guardian, [www.theguardian.com/cities/2015/oct/28/which-is-the-worlds-most-segregated-city](http://www.theguardian.com/cities/2015/oct/28/which-is-the-worlds-most-segregated-city).

When observing other cities around the world, it is clear that they face similar issues with segregation. From 2001 to 2011, 11 out of 13 major European cities experienced an increase in segregation. In Ulaanbaatar, Mongolia, the rich live downtown, while the erstwhile nomads live in “ger” tents just outside of the city.<sup>11</sup> Segregation is an issue that most cities face. Is this economic and racial segregation inevitable?

Segregation is also apparent within the schools of American cities. When observing the ethnicity of students in different schools across the US, there is a vast amount of segregation. Between the years 1990 and 2015, 72% of

neighborhoods in the US have become less segregated. However, 62% have noticed that segregation in schools has increased. While cities have tried to integrate neighborhoods for a result of desegregating schools, it has not been the outcome they wanted. How is that possible? Studies show that more integrated schools have improved academic results for students from poorer families.<sup>12</sup> Why wouldn't more people be keen on allowing this integration of students to occur?

New York City, one of the most diverse cities in the US, suffers from some of the greatest amounts of school segregation. The reasoning for this is that wealthy families with access to a greater number of resources will send their kids to high performing and well-known schools.<sup>13</sup> Kids from low-income families are left with access to just the underachieving schools. When looking at the enrollment rates of different specialized high schools in New York City, the number of black and Hispanic kids being accepted has decreased since 1976. For Stuyvesant High School, the enrollment rate for black and Hispanic students in 1976 was 14%. In 2017, it was 4%. This decline is also visible in Brooklyn Technical High School and the Bronx High School of Science. Currently, black and Hispanic students represent 70% of the school system, however, only 10% are enrolled in specialized high schools.

Another reason that explains the segregation of students in the school system are the exams required to be accepted. To apply to any of these specialized high schools, the students must take an exam. This exam requires preparation with tutors and books which can cost a significant amount of money. This excludes lower income families and makes it difficult for their kids to even stand a chance at acceptance at a high performing school.

Currently there is a debate on whether there should be an end to standardized testing or an expansion of test preparation allowing all students to receive an equal chance of being accepted.<sup>14</sup> Another reason for the segregation of students in the school system is that many white and Asian middle-class families have avoided the neighborhood schools and rather send their kids to higher-performing schools. Some have even requested gifted programs within neighborhoods, resulting in segregated classes within a relatively diverse school. Many schools have started to terminate the screening process

## NOTES:

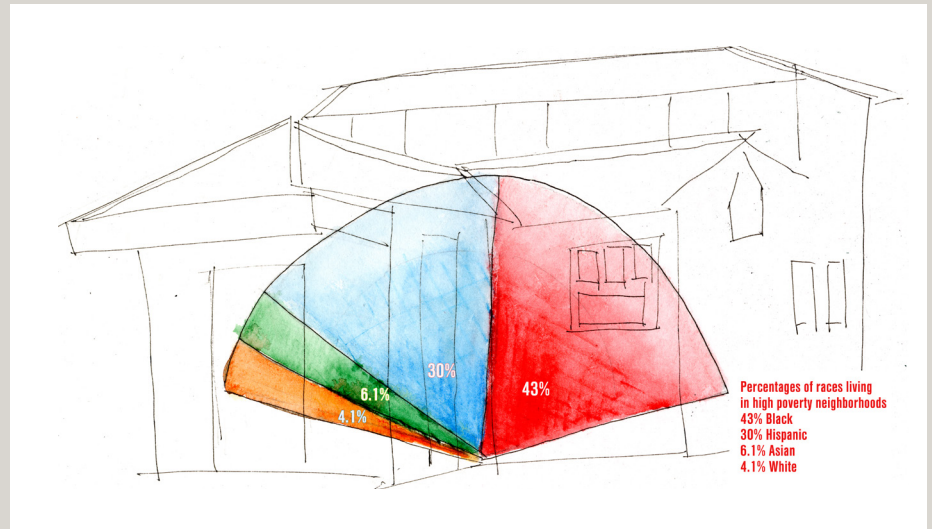
12. Barnum, Matt. "In most U.S. cities, neighborhoods have grown more integrated. Their schools haven't." Chalkbeat, 19 Nov. 2018. Chalkbeat, chalkbeat.org/posts/us/2018/11/19/in-americas-cities-neighborhoods-are-growing-more-integrated-their-schools-arent/. Accessed 24 Dec. 2019.

13. The Fight to Desegregate New York Schools. Directed by Sweta Vohra.

14. Shapiro, Eliza, and K. K. Rebecca Lai. "How New York's Elite Public Schools Lost Their Black and Hispanic Students." The New York Times, 3 June 2019. The New York Times, www.nytimes.com/interactive/2019/06/03/nyregion/nyc-public-schools-black-hispanic-students.html?rref=collection%2Fby-line%2Feliza-shapiro&action=click&contentCollection=undefined&region=stream&module=stream\_unit&version=latest&contentPlacement=4&pgtype=collection. Accessed 24 Dec. 2019.

15. Shapiro, Eliza. "Desegregation Plan: Eliminate All Gifted Programs in New York." The New York Times, 26 Aug. 2019. The New York Times, www.nytimes.com/2019/08/26/nyregion/gifted-programs-nyc-desegregation.html?rref=collection%2Fby-line%2Feliza-shapiro&action=click&contentCollection=undefined&region=stream&module=stream\_unit&version=latest&contentPlacement=6&pgtype=collection. Accessed 24 Dec. 2019.





of assessing students and rather selecting students by chance. Some have requested that Bill de Blasio, the mayor of New York City, increase the opportunities for black and Hispanic students in poorer neighborhoods by offering more gifted classes. There are others, however, who believe the opposite in that screening students benefits black and Hispanic students.<sup>15</sup>

The topic of segregation is also deeply tied to the city's expansion in gentrifying its neighborhoods. Gentrification is the process of developing a neighborhood to transform it to a middle-class standard of living. This is the action many take to avoid segregated neighborhoods within cities. Although gentrification has allowed certain neighborhoods to flourish, it has unfortunately resulted in the displacement of people from low-income families that are black or Hispanic. While crime decreases, rent increases. A study from 2000 to 2013 shows that Washington DC displaced at least 20,000 black residents.<sup>16</sup> Gentrification occurs in every city, and although the goal is to create improvements, it creates more of a struggle for those with less money.

In the next 50 years, some countries will be facing challenges with their declining populations. The birth rate no longer supports the ratio of elders there will be. Some countries facing this issue are France, Germany, Italy,

## NOTES:

16. Richardson, Jason, et al. "Shifting Neighborhoods." National Community Reinvestment Coalition, [ncrc.org/gentrification/](http://ncrc.org/gentrification/). Accessed 24 Dec. 2019.

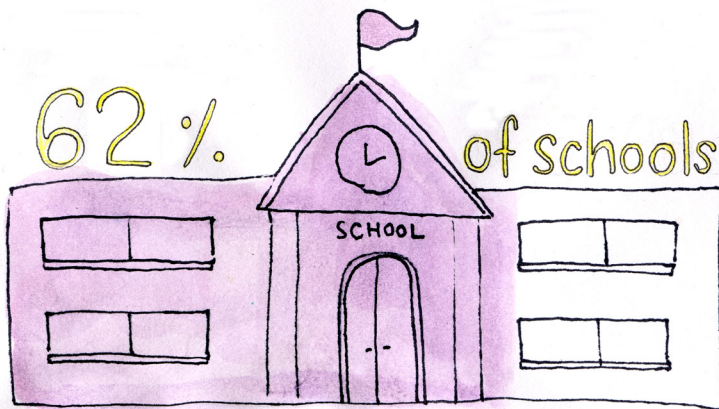
17. "Replacement Migration: Is It a Solution to Declining and Ageing Populations?" United Nations, [www.un.org/en/development/desa/population/publications/ageing/replacement-migration.asp](http://www.un.org/en/development/desa/population/publications/ageing/replacement-migration.asp). Accessed 24 Dec. 2019.

the UK, Russia, South Korea, and the USA. The UN exclaims that migration will help avoid this decline.<sup>17</sup> When looking at Washington DC and Chicago, Illinois, both cities have a great amount of immigrants and visible residential segregation. A study shows that the immigrants moving to these cities have increased the middle-class population. In doing this, less people will be in either low or high economic classes, therefore, reducing the separation between the rich and poor. In 2010, the lower income neighborhoods in Washington, D.C. consisted of 18% immigrants, 2% of Hispanic whites, 10% of non-Hispanic whites, 65% of blacks and 5% of Asians or other. The middle class consisted of 22% immigrants, while the higher class consisted of 18% immigrants. However, when looking at Houston, Texas, the immigrants coming in have not increased the middle-class population. In 2010, Houston, the lower income neighborhoods consisted of 32% immigrants, 19% of Hispanic whites, 7% of non-Hispanic whites, 34% of blacks and 9% of Asians or other. The middle class consisted of 22% immigrants, while the higher class consisted of 19% immigrants.<sup>18</sup> This study reveals that it's not clear if immigrants migrating to segregated cities helps decrease segregation.

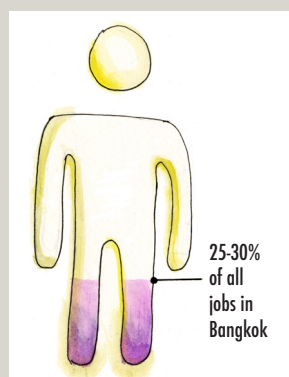
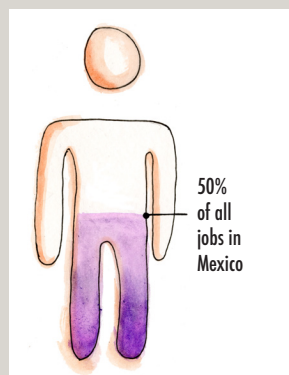
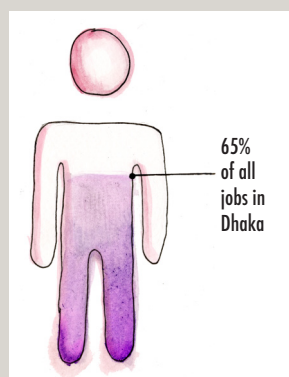
Segregation is a current global issue that has been difficult to find a solution to. Finding a solution would mean a smaller separation between rich and poor, the integration of different ethnicities within communities, and the desegregation of schools.

## NOTES:

18. Gelatt, Julia, et al. "How Immigrants Are Reshaping Residential Segregation." Urban Institute, [apps.urban.org/features/ncdb/immigrants-res-shaping-residential-segregation/index.html](https://apps.urban.org/features/ncdb/immigrants-res-shaping-residential-segregation/index.html). Accessed 1 Jan. 2020.



## % of jobs in the informal sector



## NOTES:

19. "Challenges of Living in Mega Cities." Latitude Geography, <https://www.latitudegeography.org/challenges-of-living-in-mega-cities.html>

## EMPLOYMENT IN MEGA CITIES by Lorenzo Gutierrez

*"The informal sector accounts for 65% of all jobs in Dhaka, approximately 50% of Mexico City's workforce and 25-30% of Bangkok's urban population. Jobs in the informal sector are often low in pay, labour-intensive, low in productivity and security, have poor working conditions, and have great potential for exploitation, especially of children."*

Megacities have rapidly growing populations and job creations which cannot match its pace of growth. However, informal economic activity is frequently a large part of the economy. This leaves cities without revenue to provide adequate services and informal economic conditions make wages and conditions difficult to regulate.<sup>19</sup> Without regular income, urban adults in the developing world cannot provide basic needs for themselves or their families, amounting to them falling into poverty.

As there are limited positions available in the formal economy, many urban residents have no other choice but to work in the informal sector, which plays an important role in megacities. According to the ILO (International Labour Organization), in 2013, the informal economy comprised half to three-quarters of all non-agricultural employment in developing countries. This includes those parts of a country's economy that lie outside any formal regulatory environment. The informal sector accounts for 65% of all jobs in Dhaka, approximately 50% of Mexico City's workforce and 25-30% of Bangkok's urban population. Jobs in the informal sector are often low in pay, labour-intensive, low in productivity and security, have poor working conditions, and have great potential for exploitation, especially of children. However, the informal sector does provide cheap goods and services, meeting the demands of lower income groups. People with low skill levels often create their own employment working as street vendors, bottle collectors, shoe polishers, professional beggars, food stall holders, and prostitutes. Activities in the informal sector are in fact illegal, however authorities usually



turn a blind eye or accept bribes from workers allowing them to continue. Large scale rural-urban migration occurring in megacities in the developing world can be attributed to rural people seeking better employment opportunities in urban areas. Many megacities are experiencing large scale rural-urban migration from poverty-stricken rural areas.<sup>20</sup>

These large-scale migrations bring both benefits and detriments to the city's economy and lifestyle. Today, with growth in innovations and technology advances, more job opportunities have been created, as well as replaced by machines. The most recent estimation by the World Economic Forum's "The Future of Jobs Report" affirms that 75 million jobs may be lost as companies shift to more automation. It also notes that 133 million new jobs may emerge by 2022 since tech developments will arrive in tandem with broader trends, such as the expansion of the middle class in developing countries and new energy policies.<sup>21</sup> This overall increase in job opportunities has resulted in a constant increase in GDP. It is said that in 2030, the average GDP per person will be four times greater in developed nation megacities, with 33% of households earning a disposable income exceeding \$100,000, compared to just 3.3% in emerging megacities.<sup>22</sup> It is also stated that by 2030, 9% of the global population and 15% of the world's GDP will come from these megacities.<sup>23</sup>

Urbanization is often linked with economics: increased job opportunities, a centralized market, better pay and higher individual wealth have all drawn people into cities.<sup>24</sup> As well as escaping informal economic activity in rural areas, and now with climate change and political circumstances causing an increase in refugees, more and more displaced people will flock to cities. Although the migration to cities has- for the most part- increased quality of life and decreased the poverty rate, in many LDC countries, overpopulated slums exhibit high rates of disease due to unsanitary conditions, malnutrition, and lack of basic health care. Many countries in the developing world have neither the legal nor the financial capacity to deal with the rapid growth of megacities.<sup>25</sup> The rapid growth of megacity populations also result in significant challenges in accommodating people.<sup>26</sup> Something that imposes the need for planning to further accommodate these future incoming persons and find them legal employment.

## NOTES:

20. "Employment." Social Challenges of Mega Cities in the Developing World, <https://megacitiessocial.weebly.com/employment.html>

21. Vilbert, Jean. "Technology Creates More Jobs Than It Destroys: Jean Vilbert." FEE Freeman Article, Foundation for Economic Education, 10 Sept. 2019, <https://fee.org/articles/technology-creates-more-jobs-than-it-destroys/>

22. Wood, Johnny. "Here's What You Need to Know about the Megacities of the Future." World Economic Forum, <https://www.weforum.org/agenda/2018/10/these-are-the-megacities-of-the-future/>

23. "By 2030, 15 Percent of the World's GDP Will Come From These Megacities." Work Money, <https://www.workandmoney.com/s/world-megacities-f69d-79be4164459d>

24. "Urbanization and the Megacity." World Population, <https://worldpopulationhistory.org/urbanization-and-the-megacity/>

25. "Problems, Challenges and Chances." Megacities Problems and Chances, [http://webs.schule.at/website/Megacities/problems\\_en.html](http://webs.schule.at/website/Megacities/problems_en.html)

26. "Challenges of Living in Mega Cities." Latitude Geography, <https://www.latitudegeography.org/challenges-of-living-in-mega-cities.html>



ASSYRIAN STONE RELIEF  
METMUSEUM.ORG

## NOTES:

27. "World's 'Oldest Figurative Painting' Discovered In Borneo Cave." the Guardian. N. p., 2018. <https://www.theguardian.com/science/2018/nov/07/worlds-oldest-figurative-painting-discovered-in-borneo-cave> Web. 5 Jan. 2020.

28. Mark, Joshua, and Joshua Mark. "A Brief History Of Egyptian Art." Ancient History Encyclopedia. N. p., 2020. <https://www.ancient.eu/article/1077/a-brief-history-of-egyptian-art/> Web. 5 Jan. 2020.

29. "13 Revolutionary Art Movements That Have Shaped Our Visual History." My Modern Met. N. p., 2019. <https://mymodernmet.com/important-art-movements/> Web. 5 Jan. 2020.

30. "The Location Patterns Of Artistic Clusters: A Metro- And Neighborhood-Level Analysis - Carl Grodach, Elizabeth Currid-Halkett, Nicole Foster, James Murdoch, 2014." Urban Studies (2020):. <https://journals.sagepub.com/doi/>

31. "Why Cities Can't Afford To Lose Their Artists." CityLab. N. p., 2020. <https://www.citylab.com/life/2014/12/why-cities-cant-afford-to-lose-their-artists/383298/> Web. 6 Jan. 2020.

## CREATIVITY + THE ARTS IN CITIES

by Sarah Abdellatif-Chavez

*"Art transcends time. It transcends the artist who was responsible in its creation. It shatters barriers and goes beyond them to be able to share its message and speak of its meaning. Art rises above language, class, religion, gender, and other factors that seem to divide the world. Art brings people together."*

Art and humanity have gone hand in hand for thousands of years, as seen in the oldest painting found in Borneo by French explorer Luc-Henri Fage which is said to date back 40,000 years.<sup>27</sup> The first time art began merging with urban life was in Mesopotamia and Ancient Egypt where depictions of gods, rituals, and normal life were inscribed in rock walls and siltstone slabs<sup>28</sup> as well as on architecture throughout the city. Practices such as these were soon seen on every continent on earth. No place was too remote for art to thrive, as exemplified by the Moai statues on Easter Island. As society continued to grow and change, art did too. Explosive art movements such as the Renaissance from the 14th to 17th-century,<sup>29</sup> the Baroque period, Realism, and Impressionism are examples of this change. Cities became hubs for cultural change and artistic expression, as seen in ancient Greece and Rome.

But as cities began to industrialize and place economic growth over the arts, the importance of artistic expression began to be tested. Yet, according to J. Clayton Hering, when looking at cities that thrive and have strong economies, it is definitive that "the sign of a great state or a great city is the strength of its cultural life." In a study conducted by Carl Grodach of the Queensland University of Technology, Elizabeth Currid-Halkett of the University of Southern California, and Nicole Foster and James Murdoch III of the University of Texas at Arlington, art clusters and their economic impact were investigated.<sup>30</sup> The data found that "overall, art clusters occur in 'urbanized, relatively diverse regions,' and that art hubs are indeed associated with strong economies."<sup>31</sup> This is shown by cities like New York and San Francisco that have a higher number of concentrated art hubs.

But art is not only a byproduct of a stronger economy, it can also contribute to it. According to research by New York based organizations Alliance for Arts and R.Dot, nonprofit and commercial art activities (such as galleries, exhibitions, shows, etc.) generate \$17.7 billion annually for the Big Apple. This was in the early two-thousands, and these numbers only continued to skyrocket. In a study done by the U.S. Bureau of Economic Analysis (BEA) and the National Endowment for the Arts (NEA) in 2018, it was released that the arts awarded the New York economy more than \$114 billion.<sup>32</sup> At the state level, the arts account for 7.8% of the value added to New York's economy, more than retail, construction, or transportation. This rapid increase of the commercial arts attract millions of tourists which are essential for New York to thrive. Museums such as the Museum of Modern Art attracted more than 3 million visitors from over 56 countries in 2017,<sup>33</sup> and the Metropolitan Museum of Art received over 7 million in 2018.<sup>34</sup>

The arts does not only generate economic benefit in the United States, but also in countries such as Singapore where the "National Gallery Singapore drew 1.8 million visitors in 2017, up from 1.5 million the year before."<sup>35</sup> Government spending in Singapore also increased by \$720 million from 2016 to 2017, reaching \$840.7 million. This emphasis on the arts allows a large community to connect through artistic depictions of history and cultural events.

The arts do not only have a strong economic impact, but a strong impact on health as well. Through the study of Neuroaesthetics (which is the study of how beautiful spaces impact health), spaces that incorporate art and beauty are "imperative to human psychological well-being, with positive effects on learning, social behavior, and emotional wellness."<sup>36</sup> The perception of beautiful art, architecture and more is connected to the brain's reward circuitry, and generates pleasant and positive emotions.<sup>37</sup> These positive emotions boost general happiness in a neighborhood or city area, which in turn strengthens community and can even lower crime. According to a study released in 2017 on how arts benefit communities in New York City,<sup>38</sup> researchers found that communities with art and/or cultural resources, even those in the lower 40% of income distribution had 18% less crime, 14% fewer cases of child abuse and 5% fewer obese residents compared with neighborhoods with similar racial and economic makeups that lacked cultural institutions. An increase of arts in an area was associated with higher educational achievement,

## NOTES:

32. "Arts Add \$114B To New York State Economy | NYSCA." Arts. ny.gov. N. p., 2018. <https://arts.ny.gov/blog/arts-add-114b-new-york-state-economy> Web. 7 Jan. 2020.

33. "Year In Review 2017-18 | Moma." The Museum of Modern Art. N. p., 2020. <https://www.moma.org/about/annualreport-FY18> Web. 7 Jan. 2020.

34. Metmuseum.org. N. p., 2020. <https://www.metmuseum.org/press/news/2019/2018-calendar-year-attendance> Web. 7 Jan. 2020.

35. Ho, Olivia. "Visitor Numbers For Museums, Heritage Centres Hit Record High." The Straits Times. N. p., 2019. <https://www.straitstimes.com/lifestyle/arts/visitor-numbers-for-museums-heritage-centres-hit-record-high> Web. 7 Jan. 2020.

36. International WELL Building Institute." Resources.wellcertified.com. N. p., 2020. <https://resources.wellcertified.com/articles/why-beautiful-spaces-make-us-healthier/> Web. 7 Jan. 2020.

37. Buildings, Beauty, and the Brain: A Neuroscience of Architectural Experience. N. p., 2020. [https://repository.upenn.edu/cgi/viewcontent.cgi?article=1161&context=neuroethics\\_pubs](https://repository.upenn.edu/cgi/viewcontent.cgi?article=1161&context=neuroethics_pubs) Web. 7 Jan. 2020.

38. "Crime Found To Be Lower In NYC Neighborhoods With Arts Institutions." Crain's New York Business. N. p., 2017. <https://www.craigslistnewyork.com/article/20170309/ENTERTAINMENT/170309881/arts-institutions-even-in-poor-nyc-neighborhoods-reduce-crime-a-nonprofit-hopes-to-create-space-where-new-yo> Web. 7 Jan. 2020.

## NOTES:

39. "The Impact Of Public Art Projects On Human Health | Polyvision." PolyVision. N. p., 2018. <https://polyvision.com/about/news/the-impact-of-public-art-projects-on-human-health/> Web. 7 Jan. 2020.

40. Gallery, Park. "Art And Health: The Real-World Benefits Of Viewing Art." Park West Gallery. N. p., 2019. <https://www.parkwestgallery.com/art-and-health-the-benefits-of-viewing-art/> Web. 8 Jan. 2020.

41. "Creative Communities And Arts-Based Placemaking." Pps.org. N. p., 2020. <https://www.pps.org/article/creative-communities-and-arts-based-placemaking> Web. 8 Jan. 2020.

42. "The Importance of Art in our Society – Art Shanties." Artshanties.com. N. p., 2018. <http://artshanties.com/the-importance-of-art-in-our-society/> Web. 8 Jan. 2020.

as well. Research also shows that areas that are bland and colorless "increase sadness, addiction and disease-related illnesses."<sup>39</sup> This is further supported by a study done in Norway known as the Nord-Trondelag Health Study which found that people that are exposed to art in a more frequent manner experience lower rates of anxiety and depression.<sup>40</sup>

Art is woven into the existence of cities. Throughout history, cities have been hubs for artistic expression and discussion. The arts are so essential for a city that, according to Rebecca Solnit from the Creative Communities and Arts-Based Placemaking, they are what cities are for. She states, "A city without poets, painters and photographers is sterile."<sup>41</sup> Culture, community and the arts are very tightly linked and exemplify essential pieces of the human condition which can connect to a vast amount of individuals. The history of a community can be showcased through art, allowing communication and a sense of identification with an area. Much of what we know of ancient cities is through the art that has lasted centuries, carrying the identity of a group of people the same way it does in our modern cities today. In many ways, the arts are highly underestimated, and their role in creating a healthy and diverse community is incredibly important. For this reason, we must come to agree with Martin Price who writes, "Art transcends time. It transcends the artist who was responsible in its creation. It shatters barriers and goes beyond them to be able to share its message and speak of its meaning. Art rises above language, class, religion, gender, and other factors that seem to divide the world. Art brings people together."<sup>42</sup>

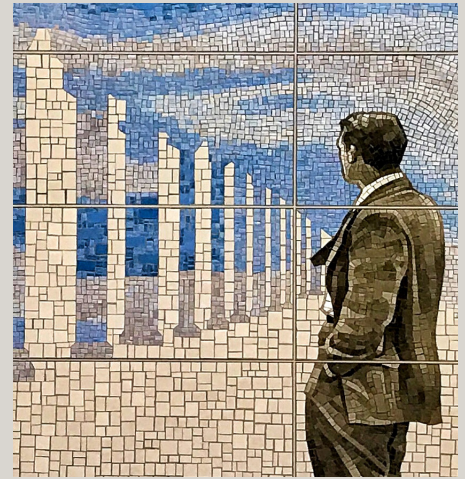


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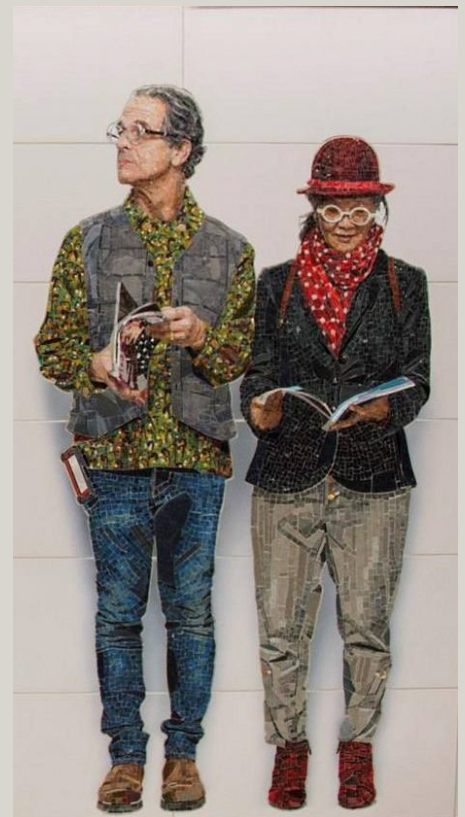




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## NATURAL DISASTERS

by Sydney McDonnough

*“Coastal megacities must revise their growth strategies and undertake major infrastructure projects designed to protect them from the dual threat of rising sea levels and intensifying storms. Currently many of the world’s fastest growing coastal cities lack that protection, however most have begun to reroute funding into infrastructural development.”*

While climate change doesn’t cause natural disasters, it does exacerbate them.<sup>43</sup> With rising populations in the world’s megacities, the dangers associated with natural disasters increase as well. 2017 has been the costliest year on record for climate-related impacts such as droughts, hurricanes, and wildfires. As time goes on, megacities become more susceptible to being struck by natural disasters, displayed in the past decades as many of the largest urban areas suffered catastrophic events such as the 1989 earthquake in San Francisco or the 2019 wildfires in California.<sup>44</sup> Though the large population and density of infrastructure places megacities at a greater risk for natural disasters than other non-metropolitan areas, they often don’t have the best resources to mitigate risk and recover from said catastrophes. Many megacities, especially those that have experienced significant growth in short periods of time, can occasionally be characterised by haphazard construction, insufficient infrastructure, and unhygienic environments.<sup>45</sup> Therefore, in order to increase preparation for natural disasters, cities need to implement disaster relief plans, sustainable infrastructure, and well thought-out city planning.

Tokyo, one of the world’s largest megacities, is located in Japan, a country that has suffered many natural disasters over the course of history. Being an island positioned over a fault line, the nation is highly susceptible to earthquakes and typhoons. Due to this, it is also one of the world leaders in disaster preparation. Infrastructure built to withstand earthquakes was already

## NOTES:

43. Hart, Marion, and Maryanne Buechner. “Natural Disasters: Young People Take on the Climate Change Factor.” UNICEF USA, 19 Sept. 2018, [www.unicefusa.org/stories/natural-disasters-young-people-take-climate-change-factor/32872](http://www.unicefusa.org/stories/natural-disasters-young-people-take-climate-change-factor/32872).

44. Mitchell, James. (1999). Megacities and natural disasters: A comparative analysis. *Geojournal*. 49. 137-142. 10.1023/A:1007024703844.

45. Kerle, Norman & Müller, Annemarie. (2013). Megacities and Natural Hazards. [https://www.researchgate.net/publication/236888991\\_Megacities\\_and\\_Natural\\_Hazards/citation/download](https://www.researchgate.net/publication/236888991_Megacities_and_Natural_Hazards/citation/download)

being built before a massive earthquake in 1923. The nation also houses one of the most sophisticated earthquake and tsunami warning systems in the world, with 300 sensors around the archipelago, including 80 aquatic sensors that monitor seismic activity.<sup>46</sup> Japan has also set up extensive emergency response plans. Prefectural Disaster Management Headquarters and Municipal Disaster Management Headquarters are set up on-site of the affected areas to better coordinate operations with the central government.<sup>47</sup> In following Japan's example, city officials across the globe should consider implementing complex disaster response plans. The frequency of weather-related disasters has only increased due to a largely sustained rise in the number of floods and storms. Between 1995-2015, flooding accounted for 47% of all weather-related disasters.<sup>48</sup>

Coastal megacities must revise their growth strategies and undertake major infrastructure projects designed to protect them from the dual threat of rising sea levels and intensifying storms. Currently many of the world's fastest growing coastal cities lack that protection, however most have begun to reroute funding into infrastructural development.<sup>49</sup> New York City has begun a gradual approach to protecting the city and its assets. The aim is to improve shoreline management, build higher seawalls and jetties to protect the subway entrances, highway tunnels and power stations from flooding. The gradual change should keep the cost manageable for the city while turning into a model of a "climate-resilient city."<sup>50</sup> This is perhaps a model that all megacities across the globe should follow as it ensures preparedness for natural disasters and could save many lives.

## NOTES:

46. Rauhala, Emily. "How Japan Became a Leader in Disaster Preparation." *Time*, Time Inc., 11 Mar. 2011, content.time.com/time/world/article/0,8599,2058390,00.html.

47. Ogata, Toshinori. "Disaster Management in Japan." *Japan Medical Association journal: JMAJ* vol. 59, 1 27-30. 1 Jul. 2016

48. [https://www.unisdr.org/2015/docs/climatechange/COP21\\_WeatherDisastersReport\\_2015\\_FINAL.pdf](https://www.unisdr.org/2015/docs/climatechange/COP21_WeatherDisastersReport_2015_FINAL.pdf)

49. Stutz, Bruce. "Too Big to Flood? Megacities Face Future of Major Storm Risk." *Yale E360*, 17 Dec. 2012, [e360.yale.edu/features/megacities\\_face\\_increasing\\_risk\\_as\\_sea\\_levels\\_rise](http://e360.yale.edu/features/megacities_face_increasing_risk_as_sea_levels_rise).

50. Stutz, Bruce. "Battered New York City Looks For Ways to Hold Back the Sea." *Yale E360*, 6 Nov. 2012, [e360.yale.edu/features/battered\\_new\\_york\\_city\\_looks\\_for\\_ways\\_to\\_hold\\_back\\_the\\_sea](http://e360.yale.edu/features/battered_new_york_city_looks_for_ways_to_hold_back_the_sea).

## NOTES:

51. Staff, Gotham Gazette. "A Brief History of New York Transportation." Gotham Gazette, 9 June 2003, [www.gothamgazette.com/transportation/1855-a-brief-history-of-new-york-transportation](http://www.gothamgazette.com/transportation/1855-a-brief-history-of-new-york-transportation).

Schrader, Robert. "The World's Busiest Subway Systems." TripSavvy, TripSavvy, 17 July 2019, [www.tripsavvy.com/the-worlds-busiest-subway-systems-4146031](http://www.tripsavvy.com/the-worlds-busiest-subway-systems-4146031).

53. Bouissou, Julien. "Mumbai's Rail Commuters Pay a High Human Price for Public Transport." The Guardian, Guardian News and Media, 29 Oct. 2013, [www.theguardian.com/world/2013/oct/29/india-mumbai-population-rail-accidents](http://www.theguardian.com/world/2013/oct/29/india-mumbai-population-rail-accidents).

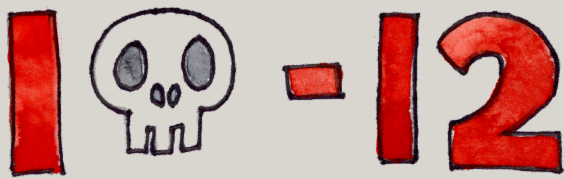
54. "7 Problems of Urban Transport (Explained With Diagram)." Geography Notes, 17 July 2014, [www.geographynotes.com/articles/7-problems-of-urban-transport-explained-with-diagram/185](http://www.geographynotes.com/articles/7-problems-of-urban-transport-explained-with-diagram/185).

## TRANSPORT AND INFRASTRUCTURE

by Max Michael

*"Characterized by populations of more than ten million people and great industrialization, the inhabitants of megacities rely on efficient infrastructure and public transportation."*

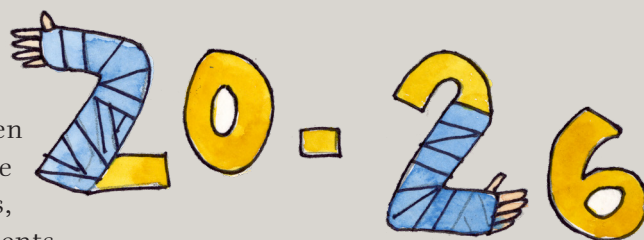
It is only common sense that a city which accommodates a growing population and influx of commuters will be one that continues growing, and therefore continues to need facilities for the daily flow of movement within its boundaries. Transportation is, and always will be, an integral component of megacities. Characterized by populations of more than ten million people and great industrialization, the inhabitants of megacities rely on efficient infrastructure and public transportation. However, with such vast numbers of people relying on public transportation within these cities, it is crucial that safety regulations and traffic laws are implemented for greater societal welfare.



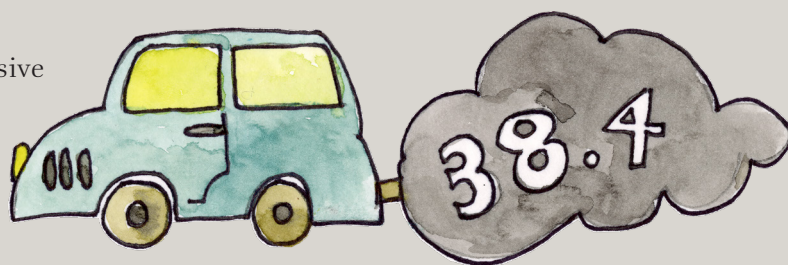
The first ever official traffic laws were established in 1652 in New York (then known as New Amsterdam). These laws set clear, numerical speed limits for transport within the city.<sup>51</sup> Horse drawn carriages were banned from being driven at a gallop in order to protect the well being of the rest of the citizens. Though New York in 1652 was by no means a megacity by today's standards, it was one of the most densely populated cities in the United

States at the time. Tokyo's subway line, which serves 8.7 million people a day,<sup>52</sup> has been equipped with platform doors from 1991 onwards before being expanded to almost all of its lines today. These doors allow serve a vital purpose as they ensure the safety of elderly and young riders, for whom falling onto the tracks is a threat. This is another example of megacities implementing transport policy and changes for the wellbeing of their citizens.

The presence of reliable public transportation is an essential necessity for many people, and therefore it is often overcrowded. The lack of upgraded roads makes transport by car inefficient in Mumbai, and places an even greater burden on the rail system. This overcrowding of the public transportation system presents great consequences, as is made evident by the 10 to 12 deaths and 20-26 accidents that are reported daily.<sup>53</sup> While the trains are extremely punctual, they are so crowded that many die from climbing onto the roofs because there is no space on board. People rely on transport to reach their places of employment, and with no seats available, they improvise and often gamble with their lives to do so.



Private transport on the other hand causes excessive traffic and congestion. The United Kingdom saw a 1.4 percent increase in the number of private licensed vehicles, pushing the total towards a whopping 38.4 million. Urban transport further poses problems for pedestrians as well, as they are the leading victims in traffic accidents.<sup>54</sup> However, in lieu of dealing with the problems that cause pedestrian deaths—such as speeding, congestion, and the mere volume of traffic—megacities have begun to restrict the movement of pedestrians. Smaller sidewalks so that traffic lanes can be made larger is not an unusual occurrence in many American cities. Though it can be argued that they help accommodate the volume of traffic, congestion laws—as NYC implemented recently—would be far more effective. Parking also proves to be a challenge. Many megacities struggle to keep a balance of population to parking spaces. In some cases, parking lots cover a third of land area downtown.<sup>55</sup> Some find them eyesore, ruining cities streets and skylines with their signs and harsh metals. In other cases, there are simply not enough parking spots within megacities and people have to rely on costly cab services.



Urban transport also has an extreme effect on the environment. According to the World Health Organization, urban transport is responsible for a large sector of urban air pollution.<sup>56</sup> They estimate that road transport

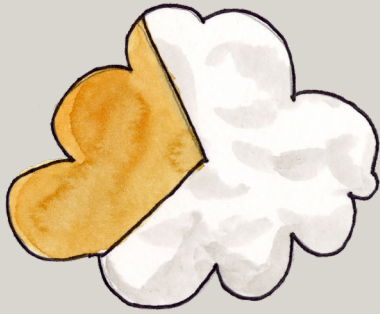
## NOTES:

55. "Urban Parking as Economic Solution." Parking, 29 Feb. 2016, [www.parking-mobility.org/2016/01/19/tpp-2013-12-urban-parking-as-economic-solution/](http://www.parking-mobility.org/2016/01/19/tpp-2013-12-urban-parking-as-economic-solution/).

56. "Air Pollution." World Health Organization, World Health Organization, 30 Jan. 2020, [www.who.int/sustainable-development/transport/health-risks/air-pollution/en/](http://www.who.int/sustainable-development/transport/health-risks/air-pollution/en/).

## ARTICLE 6

TRANSPORT AND INFRASTRUCTURE | MAX MICHAEL



makes up 30% of particulate emissions in European cities. Particulate matter is linked closely to air pollution related deaths and illnesses. Some households hold off against buying fossil fueled cars knowing that exhaust pollution is a factor in the climate crisis we are experiencing now.<sup>57</sup> Deaths related to overcrowding, pollution, and traffic all stem from urban transport. However, many cities are taking measures to decrease the harmful effects of the transport sector on the environment and metropolises. Further, megacities such as London, Tokyo, and Sao Paulo are investing more time into creating efficient public transport systems in an effort to encourage people to limit the use of private vehicles.

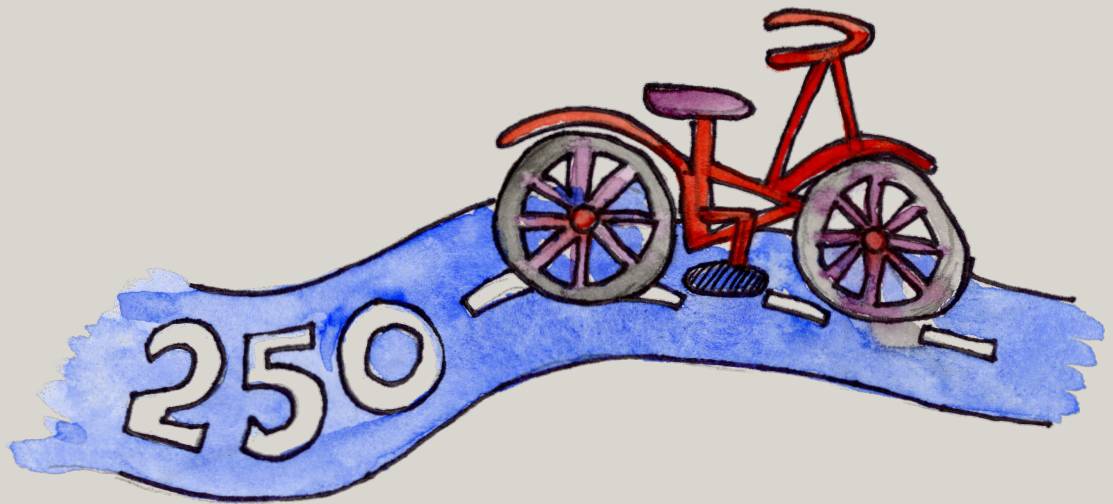
## NOTES:

57. "Public Transportation in Megacities Changing the Rules of the Market." StackPath, [www.masstransitmag.com/home/blog/11291829/public-transportation-in-megacities-changing-the-rules-of-the-market](http://www.masstransitmag.com/home/blog/11291829/public-transportation-in-megacities-changing-the-rules-of-the-market).

58. Queensland; c=AU; o=The State of. "Benefits of Riding." Transport and Motoring | Queensland Government, CorporateName=The State of Queensland; Jurisdiction=Queensland, 26 Jan. 2020, [www.tmr.qld.gov.au/Travel-and-transport/Cycling/Benefits.aspx](http://www.tmr.qld.gov.au/Travel-and-transport/Cycling/Benefits.aspx).

59. Stevenson, Frances. "Does Bike Commuting Impact Your Carbon Footprint? And How Much?" Our Streets Minneapolis, [www.ourstreetsmpls.org/does\\_bike\\_commuting\\_affect\\_your\\_carbon\\_footprint\\_and\\_how\\_much](http://www.ourstreetsmpls.org/does_bike_commuting_affect_your_carbon_footprint_and_how_much).

60. Kilgannon, Corey. "Why 250 Miles of Bike Lanes Are Being Built." The New York Times, The New York Times, 29 Oct. 2019, [www.nytimes.com/2019/10/29/nyregion/nyc-bike-lanes.html](http://www.nytimes.com/2019/10/29/nyregion/nyc-bike-lanes.html).



Cycling is also a great way to reduce traffic volumes and provide increased mobility in megacities, and many have adopted wider and more ubiquitous bicycle lanes to encourage this. Cycling provides an option that is economical and independent, which is especially useful to those who may have limited options for public transport.<sup>58</sup> Bikes don't require energy in the way that motorized vehicles do, and their carbon footprint is virtually nonexistent,<sup>59</sup> making them a more economical and environmentally friendly mode of transport. Corey Johnson, a New York City Council Speaker, has created a bill that would create 250 miles of protected bike lanes in one of the most crowded and car centered megacities. In 2021,



NYC will also be implementing tolls to access certain parts of the city,<sup>60</sup> hoping to see a decrease in privately owned vehicles and possibly an increase in cycling as a popular mode of transport.

Megacities unequivocally rely on well managed public transportation. With these cities being hubs for employment and opportunity, inhabitants rely on cheap, efficient, and fast transport for their daily activities. Though many cities have been pioneers in developing state of the art public transport systems, others continue to lag behind. Unfortunately, for those that fall behind, their citizens pay the price. However, transport in megacities is not limited to the public sector. In the private sector, many megacities have benefited from enacting congestion taxes, strict traffic rules, and accessible bicycle lanes. Such solutions to keep up with the transportation needs of an ever-increasing population are absolutely essential in the development and further growth of these cities.



© Dennis Van De Water. Amsterdam Canals in the Spring

## CRIME IN MEGA CITIES

by Céline Wooning

*“Studies have shown that globally, cities from countries with more economic inequality are more likely to have higher crime rates. It has been suggested that when a country’s economy is in decline, the crime rate will increase. An increase in the rate of unemployment has also been shown to have an impact on the rate of crime.”*

Since the beginning of the century, crime rates in cities have been decreasing significantly, making them safer places for people to live in. This phenomenon has been seen across many megacities across the world, particularly those in the Western hemisphere, including Los Angeles, London, and Paris. For example, the number of major felony offenses in New York City has decreased from 184,652 in 2000 to 95,883 in 2018.<sup>61</sup> While the definitive reasons for these decreases in crime are unknown, experts have proposed several theories as to why crime rates continue to fall: economic growth, an increase in public works, gentrification, and an increase in police action.<sup>62</sup>

## NOTES:

61. “Seven Major Felony Offenses.” NYC Gov., [www1.nyc.gov/assets/nypd/downloads/pdf/analysis\\_and\\_planning/historical-crime-data/seven-major-felony-offenses-2000-2018.pdf](http://www1.nyc.gov/assets/nypd/downloads/pdf/analysis_and_planning/historical-crime-data/seven-major-felony-offenses-2000-2018.pdf).

62. Gopnik, Adam. “The Great Crime Decline.” *The New Yorker*, *The New Yorker*, 9 July 2019, [www.newyorker.com/magazine/2018/02/12/the-great-crime-decline](http://www.newyorker.com/magazine/2018/02/12/the-great-crime-decline).

63. Klinenberg, Eric. “The Other Side of ‘Broken Windows.’” *The New Yorker*, *The New Yorker*, 28 Aug. 2018, [www.newyorker.com/books/page-turner/the-other-side-of-broken-windows](http://www.newyorker.com/books/page-turner/the-other-side-of-broken-windows).

Studies have shown that globally, cities from countries with more economic inequality are more likely to have higher crime rates. It has been suggested that when a country’s economy is in decline, the crime rate will increase. An increase in the rate of unemployment has also been shown to have an impact on the rate of crime.

One theory for why crime has decreased across several cities is the implementation of ‘broken windows’ policing. This practice was developed by James Q. Wilson and George Kelling who believed that visible signs of crime would cause an overall increase in crime rates. As a result, they stated that officers should police petty crimes including graffiti, loitering, and panhandling more aggressively in order to reduce the overall crime rate.<sup>63</sup>

In New York, the decrease in the crime rate from 1994-2001 was largely attributed to Rudy Giuliani's 'broken windows' policing.<sup>64</sup> This policy was effective to the extent that it did cause the crime rate to decrease; however, a study by Hope Corma and Naci Mocan has shown that this type of policing only impacts the rates of misdemeanors including robbery and motor vehicle theft and does not affect the rate of crime.<sup>65</sup> While this policy was somewhat effective, it resulted in the unfair treatment of people of colour.

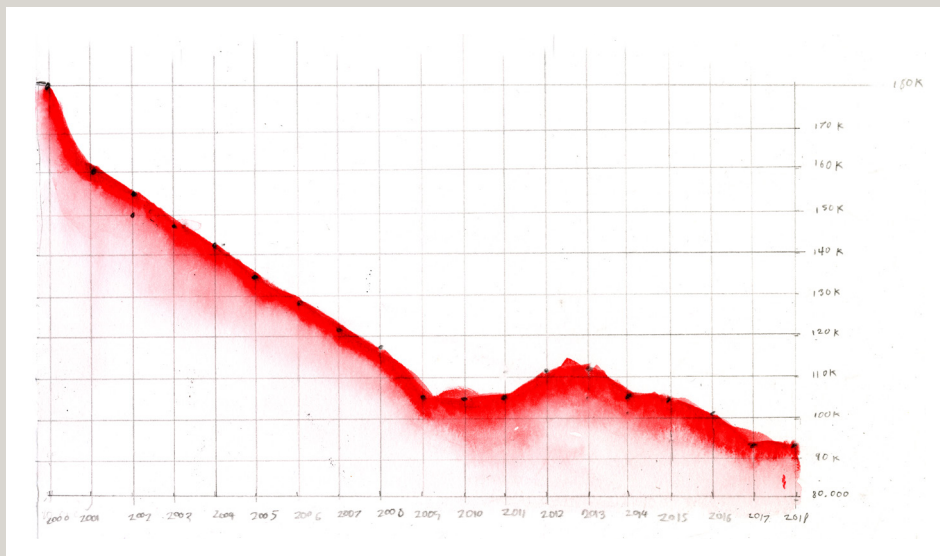
Though many theories exist as to why crime rates decrease in megacities, with a prominent theory from NYU sociologist Patrick Sharkey stating that it is the "intersection of community action and coercive policing" which causes the decline,<sup>66</sup> there is no definite answer. The nature of crimes and the causes for their decline are independent to each country and its cities, so a blanket causality cannot be determined. However, it can be argued that the opportunities that megacities propose offer an alternative to those who may have otherwise turned to crime. The development of government funded schools, increased employment opportunities, the availability of public housing, and various policing techniques all play some role. However, though a definite cause cannot be established, there is ample evidence to support the claim that megacities continue to see a decline in crime rates as they continue to develop.

## NOTES:

64. "What Reduced Crime in New York City." The National Bureau of Economic Integration, [www.nber.org/digest/jan03/w9061.html](http://www.nber.org/digest/jan03/w9061.html).

65. Mocan, Naci. "CARROTS, STICKS AND BROKEN WINDOWS." The National Bureau of Economic Integration, [www.nber.org/papers/w9061.pdf](http://www.nber.org/papers/w9061.pdf).

66. Gopnik, Adam. "The Great Crime Decline." The New Yorker, The New Yorker, 9 July 2019, [www.newyorker.com/magazine/2018/02/12/the-great-crime-decline](http://www.newyorker.com/magazine/2018/02/12/the-great-crime-decline).



NUMBER OF FELONIES IN NEW YORK CITY  
BETWEEN 2000 AND 2018.

## SUSTAINABILITY

by Luca Pang

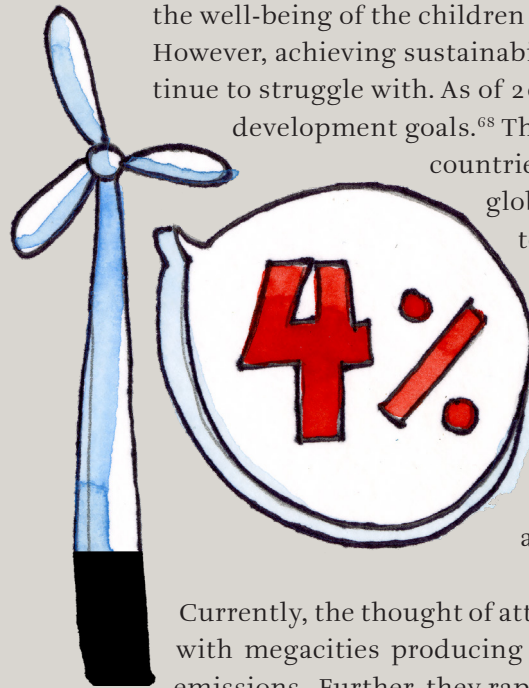
*“While this lifestyle has carried our society to the level of advancement and development that we live in today, to continue with these non-sustainable practices would condemn future generations to a lack of vital resources and irreversible climate change, both of which are problems that could be remedied today.”*

## NOTES:

67. “UN World Commission on Environment and Development, Ed., Report of the World Commission on Environment and Development: Our Common Future.” UN World Commission on Environment and Development, Ed., Report of the World Commission on Environment and Development: Our Common Future | Environment & Society Portal, [www.environmentandsociety.org/mml/un-world-commission-environment-and-development-ed-report-world-commission-environment-and](http://www.environmentandsociety.org/mml/un-world-commission-environment-and-development-ed-report-world-commission-environment-and).

68. “Sustainable Development Goals .. Sustainable Development Knowledge Platform.” United Nations, United Nations, [sustainabledevelopment.un.org/?menu=1300](http://sustainabledevelopment.un.org/?menu=1300).

69. “About the Sustainable Development Goals - United Nations Sustainable Development.” United Nations, United Nations, [www.un.org/sustainabledevelopment/sustainable-development-goals/](http://www.un.org/sustainabledevelopment/sustainable-development-goals/).



The United Nations World Commission on Environment and Development defines sustainable development as “development that meets the needs of the present without compromising the ability of future generations to meet their own needs.”<sup>67</sup> In essence, sustainability promises the well-being of the children and grand-children of today’s generations. However, achieving sustainability is a complex concept that nations continue to struggle with. As of 2015, the UN has established 17 sustainable development goals.<sup>68</sup> These goals are an urgent call to action for all

countries, both developed and developing. Through global partnership, the SDGs act as a blueprint to achieve a more sustainable future for all.

They address the global challenges we face, including those related to poverty, inequality, climate change, environmental degradation, peace and justice.<sup>69</sup> Due to the SDGs, the question is not what is required to achieve worldwide sustainability, but rather how we are going to achieve it.

Currently, the thought of attaining a fully sustainable lifestyle is far off, with megacities producing massive amounts of industrial waste and emissions. Further, they rapidly consume several resources such as fos-

sil fuels, trees, and water. In 2016, the world's cities generated 2.01 billion tons of solid waste, amounting to a footprint of 0.74 kilograms per person per day.<sup>70</sup> Historically, humans have been consumers rather than replenishers of environmental resources. While this lifestyle has carried our society to the level of advancement and development that we live in today, to continue with these non-sustainable practices would condemn future generations to a lack of vital resources and irreversible climate change, both of which are problems that could be remedied today. Presently, the leading form of energy we consume derives from fossil fuels.<sup>71</sup> Three fossil fuels in particular—petroleum, natural gas, and coal—have provided more than 80% of total U.S. energy consumption for more than 100 years. In 2015, fossil fuels made up 81.5% of total U.S. energy consumption, the lowest fossil fuel share in the past century.<sup>72</sup>

Burning fossil fuels is an unsustainable form of energy consumption due to the vast amounts of greenhouse gases that damage the ozone layer and ultimately lead to climate change. Global carbon emissions from fossil fuels have significantly increased since 1900. Since 1970, CO<sub>2</sub> emissions have

## NOTES:

70. "Sustainability Statistics Worth Knowing in 2019." SUMAS, 7 Jan. 2019, [sumas.ch/sustainability-statistics/](http://sumas.ch/sustainability-statistics/).

71. Energy Resources, [www.tulane.edu/sanelson/eens1110/energy.htm](http://www.tulane.edu/sanelson/eens1110/energy.htm).

72. "U.S. Energy Information Administration - EIA - Independent Statistics and Analysis." Fossil Fuels Still Dominate U.S. Energy Consumption despite Recent Market Share Decline - Today in Energy - U.S. Energy Information Administration (EIA), [www.eia.gov/todayinenergy/detail.php?id=26912](http://www.eia.gov/todayinenergy/detail.php?id=26912).



increased by about 90%, with emissions from fossil fuel combustion and industrial processes contributing about 78% of the total greenhouse gas emissions increase from 1970 to 2011.<sup>73</sup> In order to secure a life for future generations, alternative sustainable energy sources such as wind turbines, water generators, and solar panels could be utilized to a further extent. In 2017, 314,000 wind turbines supplied nearly 4% of global electricity.<sup>74</sup>

While many unsustainable habits are currently fostered by societies globally, the use of renewable energy continues to increase. In 2016, the world produced approximately 5.9 terawatt-hour of modern renewable energy, showing a 5 to 6-fold increase since the 1960s.<sup>75</sup> It is vital that new, cleaner technologies are developed to satiate our rising energy demands and that megacities across the world readily adopt these newer, more sustainable alternatives. Sustainability however, is not just concerned with renewable energy. Social activism movements such as Fair Trade and the Rainforest Alliance address the social development aspect of sustainability and ensure farmers receive a decent living wage in order to encourage them to enact sustainable practices, which are often more costly. Activist and sustainability professionals further hope to remove trade barriers, contributing to the economic and social development core of sustainability while promoting good environmental practice by those in the farming industry.

#### NOTES:

73. "Global Greenhouse Gas Emissions Data." EPA, Environmental Protection Agency, 13 Sept. 2019, [www.epa.gov/ghgemissions/global-greenhouse-gas-emissions-data](http://www.epa.gov/ghgemissions/global-greenhouse-gas-emissions-data).

74. Shaw, Taylor. "56 Sustainability Statistics Planners Need to Know." Aventri, [www.aventri.com/blog/56-sustainability-statistics-planners-need-to-know](http://www.aventri.com/blog/56-sustainability-statistics-planners-need-to-know).

75. "Sustainability Statistics Worth Knowing in 2019." SUMAS, 7 Jan. 2019, [sumas.ch/sustainability-statistics/](http://sumas.ch/sustainability-statistics/).



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## ALTERNATIVE CITIES

### by Rizky Lubis

#### NOTES:

76. Wood, Johnny. "Here's What You Need to Know about the Megacities of the Future." World Economic Forum, [www.weforum.org/agenda/2018/10/these-are-the-megacities-of-the-future/](http://www.weforum.org/agenda/2018/10/these-are-the-megacities-of-the-future/).

77. "Growing at a Slower Pace, World Population Is Expected to Reach 9.7 Billion in 2050 and Could Peak at Nearly 11 Billion around 2100 | UN DESA Department of Economic and Social Affairs." United Nations, United Nations, [www.un.org/development/desa/en/news/population/world-population-prospects-2019.html](http://www.un.org/development/desa/en/news/population/world-population-prospects-2019.html).

78. Wood, Johnny. "Here's What You Need to Know about the Megacities of the Future." World Economic Forum, [www.weforum.org/agenda/2018/10/these-are-the-megacities-of-the-future/](http://www.weforum.org/agenda/2018/10/these-are-the-megacities-of-the-future/).

79. Snowden, Heather. "Building the Sustainable Cities of the Future." TechRadar, TechRadar, 13 Sept. 2018, [www.techradar.com/news/building-the-sustainable-cities-of-the-future](http://www.techradar.com/news/building-the-sustainable-cities-of-the-future).

80. "Vertical Forest." Stefano Boeri Architetti, 12 Feb. 2020, [www.stefanoboeriarchitetti.net/en/project/vertical-forest/](http://www.stefanoboeriarchitetti.net/en/project/vertical-forest/).

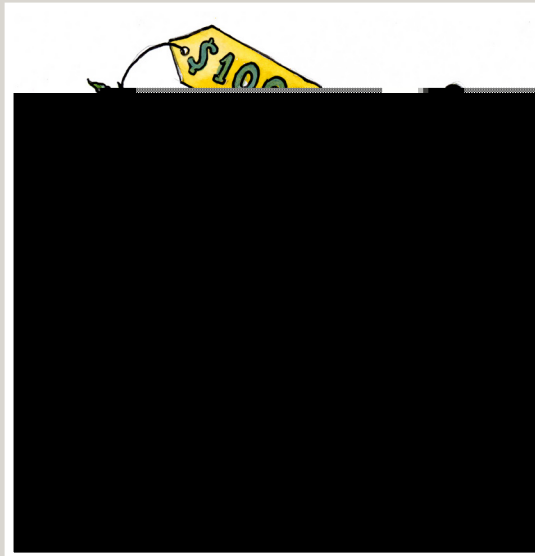
Throughout history, cities have evolved from small settlements to the megacities we know today. According to the World Economic Forum, in 1900, an approximate 15% of the world population lived in cities, whereas today more than 50% reside in cities. The growth trend is expected to continue with an estimated 60% of the global population living in cities by 2030.<sup>76</sup> In a recent study by the United Nations in 2019, the world population is expected to reach 9.7 billion.<sup>77</sup> The demand for cities is growing with an anticipated six new megacities by 2030.<sup>78</sup> Modern day megacities have evolved over time to accommodate an influx of inhabitants. However, as governments struggle with providing efficient housing, public transportation, and infrastructure, a question arises as to what the future will look like, and how cities could benefit if they were designed rather than evolved.

Sustainability is an issue to be tackled for the cities of the future. Two of the great challenges are managing the city's impact on the environment, while also feeding the population. Innovative food solutions are important given the growing population projections. Vertical farming, hydroponics, and aeroponics are just some of the solutions that are currently in development. Prominent examples include AeroFarms, a company in New Jersey planning to build a 12 story vertical farm across 78,000 square feet to grow leafy vegetables, and Berlin's Good Bank which incorporates restaurants and urban farming.<sup>79</sup> A recent trend in some megacities are vertical gardens or forests, which would be used to promote cleaner air conditions. Architect and urban planner Stefano Boeri is famous for his designs of vertical forests where he integrates modern residential buildings with layers of plants and vegetation with centralized irrigation to promote "architectural biodiversity."<sup>80</sup> His first designs have been built in Milan and Stefano Boeri is expected to implement his designs in China's Liuzhou Forest City which was planned in 2017 and is expected to begin construction this year.<sup>81</sup> Malaysia's own Forest City will implement

the same designs, and the country plans to build this city on four artificial islands off its southern coast.<sup>82</sup>

Malaysia's Forest City has taken an innovative approach to its infrastructure, suggesting a multi-layer system of transportation. Keeping true to its smart and eco-friendly goals, motorized traffic will all take place underground and the surface level will be car-free near prominent living areas.<sup>83</sup> Public transportation centers will play a key role and will feature ferry and light rail systems across the islands, with connections to Singapore and Kuala Lumpur.<sup>84</sup> The four artificial islands will be built around The Seagrass Preserve- a marine natural reserve- and will be the focal point of the city. The coasts of the islands will mimic its ecosystem and will combat future increases in sea level. There will be an emphasis on waterfronts and natural parks, some of which can also filter rainwater, all connected to a rooftop pedestrian system.<sup>85</sup> In addition to their sustainable goals, Malaysia's Forest City will aim to house 700,000 residents while also creating 220,000 new jobs by featuring new scientific research facilities and financial institutions among others, all across a space of 30 square kilometers costing approximately \$100 billion USD.<sup>86, 87, 88</sup>

Malaysia's Forest City is not the only designed city of the future, but other countries such as China and the United Arab Emirates are following in the same direction. The future of innovative and sustainable designed cities has become a reality, and perhaps there could be a global trend towards these kinds of cities in the near future.



## NOTES:

81. Alleyne, Allyssia. "China Unveils Plans for World's First Pollution-Eating 'Forest City'." CNN, Cable News Network, 30 June 2017, edition.cnn.com/style/article/china-liuzhou-forest-city/index.html.

82. Larmer, Brook. "A Malaysian Insta-City Becomes a Flash Point for Chinese Colonialism - and Capital Flight." The New York Times, The New York Times, 13 Mar. 2018, www.nytimes.com/2018/03/13/magazine/a-malaysian-insta-city-becomes-a-flash-point-for-chinese-colonialism-and-capital-flight.html.

83. Ibid.

84. "Forest City Master Plan." Sasaki, www.sasaki.com/projects/forest-city-master-plan/.

85. "Forest City: A Lush New Car-Free Island Metropolis in Malaysia." Dornob RSS, dornob.com/forest-city-a-lush-new-car-free-island-metropolis-in-malaysia/.

86. Ibid.

87. Larmer, Brook. "A Malaysian Insta-City Becomes a Flash Point for Chinese Colonialism - and Capital Flight." The New York Times, The New York Times, 13 Mar. 2018, www.nytimes.com/2018/03/13/magazine/a-malaysian-insta-city-becomes-a-flash-point-for-chinese-colonialism-and-capital-flight.html?auth=login-email&login=email.

88. "Malaysia's Forest City to Hand over 20,000 Units This Year." South China Morning Post, 10 Sept. 2019, www.scmp.com/business/article/3026354/malaysias-forest-city-handover-more-20000-residential-units-year-it.

## IMMIGRATION

by Workneh Getasew

*“Immigrants also bring creative diversity to cities because they are innovators. For example, educated immigrants have more patents than educated natives. These inventions are used in industries and grow the economy. This shows how immigrants are bringing creativity to cities because they have more creative and economically beneficial ideas than non-immigrants.”*

The United Nations (UN) defines immigrants as foreign-born persons and immigration as a “movement regardless of legal status or voluntary/involuntary circumstances. According to the UN, there were 258 million international immigrants in 2017 with an expected 2.4% increase every year. Of these immigrants, 106 million are from Asia, 61 million from Europe, 38 million from Latin America and the Caribbean, and 36 million from continental Africa. (Editors of Institute National). Of these immigrants, only 10% are refugees. The US has the largest number of immigrants with 39.8 million (one in five of its population) with Saudi Arabia and Germany tied in second place with 11.7 million immigrants. (Editors of Institute National). Immigrants enrich cities with their art, culture, food, and language. As megacities across the globe see an influx of immigrants, a question arises as to how they could impact the creative diversity of these cities and potentially be a solution for the low birth rate within them.<sup>89</sup>

### NOTES:

89. Editors of Institute National, editor. “Migration worldwide.” Institute National, 28 Mar. 2018, [www.ined.fr/en/everything\\_about\\_population/demographic-facts-sheets/focus-on/migration-worldwide/](http://www.ined.fr/en/everything_about_population/demographic-facts-sheets/focus-on/migration-worldwide/). Accessed 8 Jan. 2020.

90. Kosten, Dan. “immigrants as Economic Contributors: Immigrant Entrepreneurs.” National Immigration Forum, 2018, [immigrationforum.org/article/immigrants-as-economic-contributors-immigrant-entrepreneurs/](http://immigrationforum.org/article/immigrants-as-economic-contributors-immigrant-entrepreneurs/). Accessed 8 Jan. 2020.

Immigration is a potential solution to low birth rates because it increases the working-class population. According to the World Bank, in the vast majority of countries that support large cities the birth rate is below 2 children per woman, which in essence means that population growth is declining. For example, the birth rate in Canada is 1.5 children per woman (World Bank).<sup>90</sup> This poses a problem in countries such as Japan (1.4 children per woman) because there are not enough young people to take care of the grow-



ing older generation, an integral part of the culture, and there is a shrinking workforce (World Bank). Furthermore, with a growing retired class in developed countries, a great strain is placed on social security since there are not enough workers to contribute to the economy and taxes.

However, immigration provides an easy fix to both these problems because many immigrants have a proclivity to work in less specialized jobs. When they take up these jobs, they become taxpayers which help the nation's economy, and are also able to sustain a family, further perpetuating the cycle of economic growth. While some believe that first-generation immigrants depend more on government support due to their tendency to have more children than non-immigrants, their primary dependency on the government is paid back in folds by their children as they tend to earn more money than the children of non-immigrants. As a result, immigrants are a great investment for megacities since their children pay more in state and federal taxes than non-immigrants and positively impact the long-term economic growth of the country (Zukerman [00:22:20]). Ergo, it can be argued that immigrants are a solution to low birth rates since they are able to counter the problems it causes.

It is quite intuitive that immigrants greatly help to create creative diversity in cities as they tend to bring their culture with them. According to the National Immigration Forum, as of 2016 immigrants in the US are three times more likely to open businesses than those born in the US. Despite the immigration population being 13% in the US, 20% of new businesses were owned by immigrants in 2014 and 29.5% in 2016 (Kosten) thus bringing \$220,280 million in payroll. This shows how immigrants bring creative diversity to cities because many of these businesses reflect the cultures that the owners came from.

Immigrants also bring creative diversity to cities because they are innovators. For example, educated immigrants have more patents than educated natives. These inventions are used in industries and grow the economy (Zukerman [00:22:20]). This shows how immigrants are bringing creativity to cities because they have more creative and economically beneficial ideas than non-immigrants. Though some argue that immigrants bring

crime instead of creative diversity, a study by King's College in London strongly counters this point. The study analyzed crime rate of immigrants and the consensus was that when immigrants arrive in a country with the right to work, they actually tend to lower the crime rate because immigrants are more likely to abstain from crime-related activities when compared to native-born citizens.<sup>91</sup>

Immigrants are solutions to low birth rates because they combat the problem of the decreasing number of the working-class population in developed countries by sustaining the economy and ensuring tax returns. Furthermore, immigrants are needed for creative diversity in cities because they are likely to open businesses and bring their culture and ambitions with them.<sup>92</sup>

## NOTES:

91. World Bank. "Fertility rate, total (births per woman)." The World Bank, 2017, [data.worldbank.org/indicator/SP.DYN.TFRT.IN](https://data.worldbank.org/indicator/SP.DYN.TFRT.IN). Accessed 8 Jan. 2020.

92. Zukerman, Wendy, producer. "Immigration." Science vs, Spotify, 9 Mar. 2017. Accessed 8 Jan. 2020.

**AFTERWORD**

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The global wave of urbanization will undoubtedly be an essential part of the future. While this large scale shift towards urban life may elevate standards of living by increasing opportunity, it may also bring about political and social change. In order to inform and expand your outlooks upon an issue that represents a significant aspect of our futures, the UNIS-UN Executive Committee invited experts to address the ever-relevant questions surrounding the development and advancement of global megacities, and how we can work towards making them more sustainable.

The objective of the Working Paper is, of course, to consider the myriad implications of urbanization, and provide an understanding of their significance. We hope that each facet of this year's conference has provided you with knowledge regarding the environmental, economic, political, and social aspects of megacities, and that with this information you can formulate your own opinions and solutions to the outlined issues.

—

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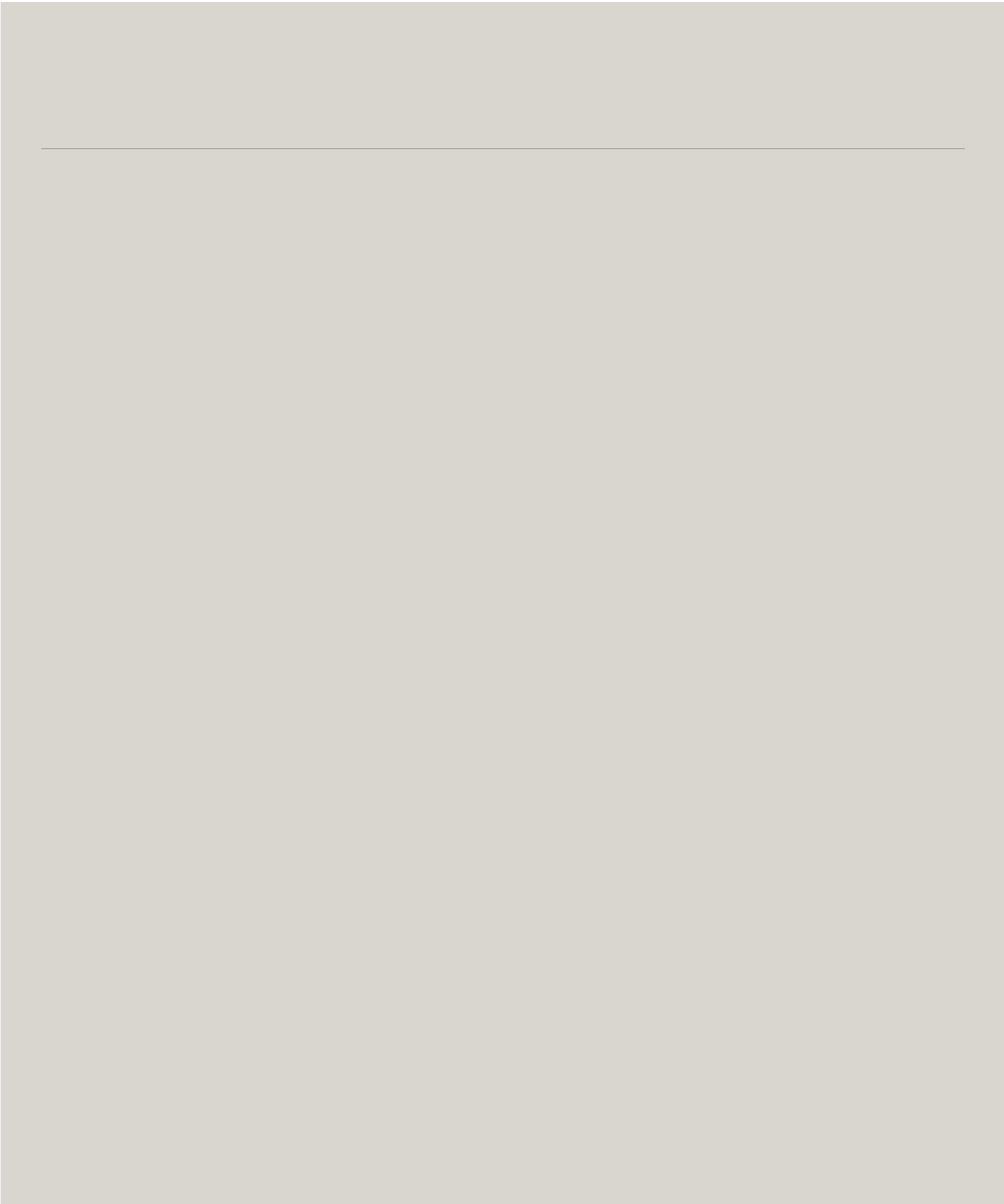
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*Working Paper*

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