Hilary Ballon: She's cool as a cucumber even when technology lets her down.

Marilyn Jordan Taylor: The dreaded restart.

Hilary Ballon: But I'd nominate Marilyn Jordan Taylor as the quintessential urbanist. She's just stepped down as the chairman of Skidmore, Owings, and Merrill and continues to run the international practice there in urban design and planning. She's had a hand in virtually every important urban planning project in New York in recent years. Her projects include the East River waterfront master plan, the reclamation of the Con Ed East River sites for mixed-use development, the new Pennsylvania Station, and lucky for us President Bollinger had the wisdom to hire her to work on Columbia's Manhattanville master plan. Transportation infrastructure is Marilyn's watchword in the cities around the globe, including Hong Kong, Singapore, Kuala Lumpur, and elsewhere in Asia. She's worked on master-planned airports and connected transportation resources to inner cities. Today she's going to talk about her work in China as well. Marilyn Jordan Taylor.

Marilyn Jordan Taylor: Thank you everyone. Sorry for that restart process. Hilary, thank you so much for the introduction, and thank you also to Provost Alan Brinkley and to the conveners for the invitation to participate in the symposium. It's really a privilege to be here.

Yung Ho and Steven have given you great views and extraordinary insights on design in a very uncertain world. I'll add to that. I think it would be interesting to watch how the slides and how our stories and how our experiences weave together.

Meanwhile, before you on the screen, courtesy of satellite photography and architect and urbanist Richard Rogers, is Tokyo. Today and through at least the year 2015 the city counted as the world's largest, a striking form, an extraordinary man-made place, visible from space, one of three world cities I’d like us to consider as I begin my comments.
From all aspects and points of view, the city is clearly one of man's most extraordinary creations, as we see as we visit Shanghai. Going to Shanghai is exciting and more often than not exhilarating. The pace, the sense of adventure and risk, the imperatives of the future all hover in the air, in the streets, and in the steps of those seeking a change in fortune by virtue of being a participant in city life. Had we, however, visited New York's Lower East Side but a century earlier, the scene would've held many of the same elements. A few decades after this photo, writers engaged in the Depression-era preparation of the *WPA Guide to New York* captured this sense of vibrancy and the mythology already developing around New York. "The rumor of a great city," they wrote, "goes out beyond its borders to all the latitudes of the known Earth."

Shanghai may be to the twenty-first century what New York was to the twentieth, yet our city, New York, remains extraordinary. As Kenneth Jackson, professor, writes, "Americans need New York because New York is one of the few places in the country that allows difference to be celebrated, that allows people to reach their full potential. . . . New York is really the hope of the future because it's there for all of us. Whether we never go there, whether we never see New York"—imagine that—"whatever small town or small city we're from, it's important that we know that New York is there to welcome us in case we want to be different."

Three cities: Tokyo, Shanghai, New York. Has Tokyo been, can Shanghai become, of similar importance and value to their countries and to us as individuals in the face of change?

I'm going to talk for a moment about urbanization. Today we face an increasingly urbanized globe. Our use of energy creates in space a beautiful portrait of the interlinked networks of cities and production centers. As projected by the United Nations in its assessment of world-urbanization prospects, this is the decade and 2007 is the year in which for the first time the number of urban dwellers will equal the number of rural dwellers. My other planning partners and I in SOM enjoy communicating this to the architectural design partners as we see our moment coming.

Within a very few years, by the year 2015, 36 of the world's cities will hold populations greater than 8 million. The global distribution of these cities clearly indicates the emergence of India, China, and Asia as the focus of the supersize city. In comparing the list of megacities from 1994 with the projected list for 2015, several observations can be drawn. Tokyo remains at the top of the list, New York drops from second to eleventh, Mexico City drops from fourth to tenth but surpasses New York, Los Angeles drops from seventh to seventeenth, and of the sixteen other top-twenty megacities, eleven are in Asia, two are in Africa, one at the boundary between Europe and Asia, and two in South America. Clearly the world in 2015 will not be the world as we have known it, but will its cities be essentially different?

I'd like now to consider six essential characteristics of twenty-first-century cities. The emerging cities of the Asia Pacific offer extraordinary opportunity to advance our fascination with one of mankind's great creations, the city itself. Since the earliest times of urban development, cities have been founded, formed, and glorified to provide a stage for leadership, showmanship, governance, dominance, religion,
trade, education, culture, architecture, and ambition. For the most successful of
these, trade, global commerce, has been an essential component, an important
lesson for the global cities of tomorrow.

Let's consider the characteristics that will define the leading cities of the early
twenty-first century. The extraordinary pace. This image refers literally to the
quickness of the lives that city dwellers live, but also the rate of change in the
district streets and spaces they inhabit. Such rate of change may be unsustainable
over the longer term, but in the shorter term it is nothing less than astounding. Is
the expression on this man's unrevealed face one of disbelief, dismay, or
excitement?

Second, the extreme density. We think of Hong Kong—sorry, rate of change. The
extreme density. We think of Hong Kong, seen here from the peak and Kowloon, as
epitomizing high-rise, high-density life, a sacrifice of space for proximity and for the
economic opportunity that proximity in the right place can bring. But this density is
arriving in Midtown New York. Should we resist? Not according to Professor Jackson,
whose view is that with density come the diversity, tolerance, and opportunity that
make New York a beacon to the world.

Third characteristic, "object architecture." The third essential defining characteristic
of the leading cities of the twenty-first century is the utilization of object
architecture. What is object architecture? For purposes of our discussion today, let's
define it to referring to those buildings and groups of buildings that are designed to
stand apart from their surroundings, to express their difference, their role as
exception from the normative forms around them. They come in many forms, those
are generally quite large ones, such as Koolhaas's winning proposal for the CCTV
headquarters in Beijing. As urban propositions they are neither inherently good nor
bad. That judgment can only be made based on time, place, and degree of
excellence involved. In fact, two of the Olympic projects project a sense of beauty
and meaning, although it remains to be seen if and how they will be realized. Living
in doubt.

Commercial object architecture risks holding itself apart from the very marketplace
on which it demands. The residential object architecture, as in this Beijing example,
can be read as strongly gated and exclusive, exempt from responsibility to
community. It creates the superblocks that will ultimately disconnect urban dwellers
from each other and from the transportation systems that can contribute to
sustainable urbanism.

These objects can be things of beauty and even of magic or symbolic power. But as
we have learned, or continue to relearn in our own cities, object architecture can also
deny the very urbanism that brings it into being. Roland Barthes offers one way out
of the dilemma that would seem appropriate to China—at this moment, according to
the New York Times, "the biggest single patron of avant-garde architecture in the
world." His message: "The skyscraper establishes the block, the block creates the
street, the street offers itself to man."

Fourth characteristic, leaping ahead here, infrastructure under stress. Redefinition of
infrastructure is required. A Western notion of infrastructure regaining currency is
that infrastructure is the responsibility of government, of the public sector. But the
cities of the twenty-first century will need a greatly broadened range of services, water, sewer, energy, transport, but also education, open space, and perhaps even culture and the arts, as well as the means to put a roof over one's head. If public infrastructure is the precedent to private investment, China's huge infrastructure program will create an opportunity for expansive economy. The Yangtze River dams are just one example of the infrastructure expansion the Chinese are leading. Similarly cities such as Singapore that build transportation and transit in advance of demand, before congestion boils over, stand to reap huge rewards.

Environmental challenge. Industrial economies and those in rapid change often overlook the environmental damage they are causing. Concentrations of people occurring in advance of plan or resources for investment overrun the systems of water, sewer, air, and transport. Lack of commitment to sustainable design prolongs the damage and can lead to irreparable harm. The cost of environmental responsibility struggles in the midst of other priorities.

Sixth and finally, global position and wealth formation. The important twenty-first-century cities occupy privileged positions in global trade and with it the opportunity for formation of new wealth. In the context of this discussion it may be tempting to object. It's as easy to see the dark side of the twenty-first-century city, uncontrollable size and growth, as it was to portray Dickensian England. But there is another side, the economic advantage. As the Economist magazine describes, "... China has witnessed probably the most dramatic burst of wealth creation in human history. Its income per head has increased sevenfold... more than 400 m people have been lifted out of severe poverty. Along its seaboard, and down the length of the Yangtze River, a middle class, perhaps 100 m strong, has been created, where none at all existed before. Visit Shanghai, and you are visiting one of the most dynamic and cosmopolitan cities on earth." The Economist continues, ""To get rich is glorious,' Deng said, and everywhere people are doing just that." The question is, By whom and to whose benefit is wealth accumulated?

With these characteristics in mind and these issues in mind, and holding urbanism as value, let's now turn to the questions posed for discussion in this session. From my comments so far I hope that it is clear that I do not agree that the cities of the Asia Pacific differ greatly from their mega-counterparts on the continents of North and South America, Africa, and Europe, but all represent significant challenges to planners, urban designers, and architects. Working only at the scale of the 10-meter storefront or of the single building gives us neither the scope nor the perspective to meet the challenges. What can design do?

I'd like to use just a few examples of our firm's recent work in Asia to help formulate strategies for planning and design of twenty-first-century cities. Just as I often introduce myself as the SOM partner who has never done a high-rise building, I join Yung Ho and Steven today in focusing on examples that more directly confront and extend the value of urbanism.

The first of these is Saigon South. The strategy is infrastructure redefined. By the mid-1990s Ho Chi Minh City, Vietnam, faced the challenge of growth. But rather than let the historic city be overrun and overwritten, the government of Vietnam sought and ultimately endorsed a different answer. They looked south to areas along the river and canals and proposed the creation of a new urban center developed in
parallel with the historic city center and treated as an integral element of the city overall.

In the course of a design competition and follow-on work that involved Koetter Kim and Associates and Kenzo Tange Associates—we keep crossing each other's paths, all of us—SOM proposed a city of islands and prepared a master plan for its implementation. The new city stretches more than 6,500 acres along a 17.8-kilometer Saigon South parkway. It begins and continues at urban density. Its early phases are located close to the historic center and adjacent to the Tan Thuan Export Processing Center and deep-water port. As the first island achieved significant development, activity moves to the next. The land between allows for flexibility in accommodating the mix of uses the marketplace, government policy, and open-space demand together support. Saigon South will ultimately be home to one million people, a capacity which is achieved by using a mix of housing types and densities.

But the character, the place of this new city comes from its setting. The new development builds around and across the city's network of rivers, canals, and waterways. Repairs to the waterway network will result in a reduction of pollution and restoration of water quality. Together with extensive parks along the river edges they become the community's open-space elements. An infrastructure for agriculture and transport is recaptured as a formative amenity. Planned infrastructure systems specifically address ways of living and working, including cultural, educational, and recreational facilities to meet an international standard of quality, yet in a very specific and local landscape.

This project is being implemented over time through a joint venture between the municipal government and its Taiwanese partners. Clear government priorities, objectives, and investments in broadly defined systems of infrastructure have channeled growth to a planned city that supports the continued health of the historic center.

The second project I'd like to show you is one called Xintiandi, an innovative neighborhood at the heart of an emerging urban district, Taipingqiao, in the former foreign-concession area of Shanghai. The strategy is bringing the past into the future. SOM developed the master plan for our client, the development company Shui On Group, led by the remarkable Vincent Lo. Other architects and planners have been, and will continue to be, involved in the subsequent planning and design commissions that are seeing the project realized. The master plan concept was based on a district development pattern rather than a quarter pattern, which is the prevailing pattern in most Chinese cities today.

The 1.6-million-square-meter development consists of an historic preservation district for tourist and cultural areas, high-density local housing, expatriate housing, community services, retail entertainment centers, corporate headquarters, and office buildings. The innovation in this plan, however, begins in the creative reinterpretation of strict and standard Chinese urban planning requirement. Aggregating open-space requirements for each city block creates extensive open-space network with a clear hierarchy of major, minor, and connecting elements between green spaces within and adjacent to the area.
Interpretation of the current planning code's open-space requirement typically results in a Corbusian-style setting with buildings in a park. But by aggregating the requirements for each block, a major park could be created to provide much-needed open space in this dense urban area. In addition, neighborhood-scaled spaces and block courtyards accommodate leisure and recreational needs.

Acknowledging the need to accommodate higher densities, this plan advocates including lower pedestrian-scale buildings in high-rise area to moderate the impact of tall buildings, rather than eliminating the hutongs. Common interpretation of current planning-code requirements again—those for building spacing and sunlight access—tend to result in tall buildings in a park, creating a setting that's totally foreign to the city itself as well as to those coming.

This plan successfully promoted preservation and the reuse of historic buildings to revitalize the area and conserve the city's unique buildings and urban fabric, a European-Chinese eclectic style of townhouses. The revitalized preservation block is the first successful historic conservation project in the city, and has become the model for conservation in Shanghai and China.

"Xintiandi . . . signifies the future of this city," writes the New York Times, "and is the first neighborhood to be completed in a 128-acre . . . master rehabilitation plan. . . . 'Xintiandi has successfully given Shanghai not just a nice development and nice buildings,' said Albert Chan, general manager of Shui On Group. 'It has somehow given Shanghai a new lifestyle, a way of life not possible before it was born.' Chan continued that more than fifteen other Chinese cities have approached Shui On to develop their own versions of Xintiandi." Here I would add replication is not the objective, although perhaps leading by example is.

A few more scenes of a street life rarely seen in areas of redevelopment. Chongming Island, the third project, a master plan again, again a competition, is one where the strategy is what I would like to call sustainability beyond the scorecard. We cannot achieve our goals for sustainable design if we only focus on scoring sheets on individual buildings. And this is an attempt by our partners to act very differently.

Let's see if I can find the pointer here. That might help a little.

Chongming Island is this piece immediately to the north of the settled area and the dense area of Shanghai. It is the fifth administrative district of the Shanghai municipality, but presently in very low-intensity, low-income farming. It contains some 500 square miles. It's larger than Cape Cod, larger than the Napa [and] Sonoma valleys, but like them an opportunity to retain natural resources and to create more intensified agriculture in direct proximity to our urban areas.

In our proposed plan, urbanization will occur, but in the form of eight cities linked by transportation. Concentration creates opportunities for the retention of the environmental resources in the center of the island. It creates opportunities for organic farming to serve the growing demands of the nearby city and to increase the economic return on the use of the land. Within the farms there are opportunities not only for green systems of water usage, but also for green villages, for life at a very different scale. The island is tied together by numerous forms of transportation that also link it back into the metropolitan region, creating an overall development
strategy that is very different than one might expect [from] the overriding of the island by urbanization, and yet something that can be a very contributing urban part of overall Shanghai.

Here's one of the eight cities being proposed. Eight hundred thousand people will live here when it's ultimately built out.

I wanted to turn for just a moment to two other locations, first Singapore and then Hong Kong, because I think these are other representations of extraordinary things that are happening through the use of infrastructure and through the use of transportation.

Early in its transformation from colony to city state, Singapore realized that land was its most scarce resource, truly being an island. So early on its first investments as it came out of colonial state were in housing, in education, and in transportation. And the result has been—and we were fortunate to participate with them in the development of the first segment of the lines—clear, convenient, democratic transportation available to all. But before these stations were designed with their clear platforms, and before the transportation alignments were put in place, we were commissioned to work with the transportation authority to do station-area plans for each potential station location and to participate in the selection of the locations where the stations ultimately would be.

I have to say it's quite remarkable to look at such a clean image of transportation, and our experience of working here was greatly heightened by going to visit the car workshop area. Visiting the shop is truly a revelation. When you arrive you are shown how the Singapore transportation authority can receive a subway car, completely disassemble it, take all the component parts out, rework them all, and within nine days reassemble that car and return it to work. And meanwhile you can eat your lunch everywhere in the shop, with the possible exception of the oil pits, where the oil is drained out of the component parts that are rebuilt and restored. A very different attitude about commitment to maintaining the essential aspect of transportation infrastructure.

So having had the opportunity to participate, we were enormously delighted to be invited back several years later to bring the train to the plane, to bring the subway to Changi Airport, which is shown in the plan here. This is Terminal One, the airport as garden, existing Terminal Two, a future Terminal Three, and in our thankfully winning competition the two atria that connect the subway station in the middle of the airport in this location. From start to finish, from start of competition to opening day this was three years, not three decades, to bring the train to the plane. And in a really wonderful piece of architecture that rather than taking you underground in a hurry welcomes you through two 40-meter-tall atria spaces, through the garden, down to the various levels of the subway platform, where a 40-meter-wide platform and a glass-enclosed pedestrian bridge connecting the tunnel tell you that you're important even as you are riding the subway.

Back up at the airport, though, through this connection of working there we had the opportunity to work with the airport authority and the government of Singapore on what a transportation terminal, what an airport terminal, should be for the future, remembering of course that these are investments in economic development and yet
at the same time statements about the extraordinary future that Singapore holds for itself. And of course the major feature of an airport is its many-acred roofs. This is approximately 220 meters by about 240 meters, and here we are 3 degrees from the equator. So we said our client you know, one of the worst things about traveling on airplanes is you don't know what time it is, you don't know what time of day it is, you don't know where you are, and you're in completely a world of unnatural environment, unnatural light. You're 4 degrees from the equator, we think that you're up to the challenge of lighting all the major public spaces of the building with natural light every day of the year from seven o'clock in the morning until seven o'clock at night. So we worked with them to come up with an idea of an active, louvered roof. There are 1,100 skylights, they are computer-actuated louvers that close on a very sunny day to let the light filter through and open on a cloudier day, producing an environment in which the person feels the activity, the vitality, the sense of natural light, and doesn't realize that it's a highly technological machine that's just making him feel better about his experience of arriving in Singapore.

Now as I said, all of this is about economic development, let us not kid ourselves, and this is what it is aimed at. Singapore's existing central business district is completely built out, and so they have created another landfill with 98 acres at its core that is intended to support over the next decades 60 million—60 million—square feet of future development. It's not so improbable when you recognize that 68 million square feet of office space is what's also projected as a need for New York City, but Singapore, an island nation, is certainly gambling on a very big future, and is using its wise investment in transportation to support that.

One more project. I just want to talk briefly about Hong Kong and its urban setting. As you all know, just before the British returned Hong Kong to the nation of China, the decision was made and implemented to move the airport from the very center dense quarters of downtown Hong Kong and Kowloon out to Lantao Island, where it proudly sits at the head of the Pearl River Delta, strongly connected to Zhongshan, Guangzhou, and Macau. This is Hong Kong at a moment, I'm interpreting here, proposing to reinterpret itself. As the strong cities of China emerge, as Shanghai rises into its moment of power and presence, complemented by the other hundreds of plus-million-person cities, Hong Kong needs to redefine itself. So the strategy here in order to effect the outcome is to embrace change, to embrace movement, and see what can be done.

This is an aerial of the airport. The Foster Terminal, the extraordinary capacity for the movement of people and goods, but there's a leftover space where the original island was of about 100 acres that is not needed directly for airport purposes. So we were asked to work with the Hong Kong airport to develop SkyCity—never very original names, we hope they get to a better one than that—which is an extended terminal complex but a city center with exhibition facilities, working offices, recreational facilities, hotels, and waterfront activities that really make the airport itself as a port a place to be, still supportive of but not necessarily any longer dependent on the city to its east.

This is that plan, in very early stages, a trade zone, an exposition zone, entertainment zones, but all tied together by walking systems below grade transit, and keyed around the activity of the airport, not just the people traveling through, but the people already working at the airport around the clock.
A key building to this is the first building and it's called SkyPlaza. It is itself a 2-million-square-foot building that mixes both transportation facilities, airport check-in, taking care of all of the things related to your travel, transferring to coaches, transferring to ferries, but at the same time a place of activity and entertainment, a place where people will actually spend time. So if you don't know whether you're looking at shopping center or airport, that's probably because that's the intention here, that it is becoming more a part of your everyday life, as you've seen in this example as well. This is now entering construction.

I'll just spend a moment wrapping up on the things I've tried to address here. The six essential characteristics: extraordinary pace is a given, extreme density is a friend, object architecture is hopefully for the better and not for the worse, infrastructure under stress is an opportunity to shape city form, environmental challenge generates new forms of community, new forms of urbanism, and global position and wealth formation reinforces the need for cities that embody diversity, tolerance, and opportunity for all.

I'm not going to review all of these. I hope you saw them embodied in the projects. But I've added two, because it's clear that in the framing of the issues of doubt and uncertainty and yet still possibility for new forms, that it is critical to take not only the longer but also the larger view, and to eliminate all single-minded forms of thinking, single use, single district, and to emphasize the fact that globally, regionally, locally, and building by building, urbanism to have its value must be something where things and people all work together.

In closing, there is an eighth strategy, an experiential one, which is: in the end the goal is not sameness, the goal is to remember the difference and the genius of each of the places that we have the privilege to work, live, and visit.

Thank you very much.