Chicago Graduation Studio
South Works, Chicago

G6 Research Book

Studio Teachers
Olondo Caso
Mitesh Dixit
Kees Kaan

Complex Projects
Chair: Prof. Dr. Kees Kaan
16km

SOUTH WORKS

ANALYSE

POSITION: ILLINOIS-CHICAGO & CHICAGO LOOP-SOUTH WORKS
2.4 sqm
2.24 sqkm

SOUTH WORKS DIMENSION

ORE WALL

INDUSTRIAL HERITAGE

Lift Bridges
There were several railroad bridges crossing the Calumet River during its industrial times, and some of them survive today although the existing ones are generally out of service. Most of these railroad bridges were vertical lift bridges, which can move up and down in service of both the railroad and the channel.
Deepen and widen Community development South Works in its heyday A new plan

Evolution of the neighbourhood growth.

136 vessels use the harbor. and two piers are built into the lake at a depth of 12 feet. deepened, widened, a channel is created by cutting through sand spit at the natural mouth of the river, for improvements in Calumet Harbor.

In 1870s, there was a large sand bar which created a bend in the river just before it emptied into Lake.
THE NORTH SIDE HAS A SURPRISINGLY LOW MURDER RATE IN COMPARISON WITH THE SOUTH.


RACE
- Blacks: 23296, 75%
- Hispanic: 6774, 22%
- Whites: 599, 3%

GENDER
- Females: 54.4%
- Males: 45.6%

HOUSEHOLD SIZE
- Average: 2.8 people

MEDIAN AGE
- South Chicago: 36.4
- Chicago: 32.3

MEDIAN HOUSEHOLD INCOME
- South Chicago: $34,001
- Chicago: $46,195
SOUTH WORKS

CONCLUSION

SOCAL
- crime
- no free time activities
- bad image
- weak community/no pride
- segregation
- single parent families
- low education
**SPATIAL**
- vacant plots
- food desert
- connectivity/infrastructure
- mono functional areas
- gang zones
- no access to lake side

**ECONOMICAL**
- unemployment
- no economical possibilities
- no housing market
- low income households
- catalyst needs
Revitalizing the Loop & North Michigan Avenue
Mayor Daley enjoyed great success, particularly in his early years, in reshaping Chicago’s landscape. He presided over an unprecedented building boom that created a spectacular downtown skyline.

Build “The New White City”
Light up every street in Chicago to provide an economic ambiance and prevent crime.

“Shoot-to-Kill” Order
The brutal suppression of dissent at the 1968 Democratic National Convention tarnished the city’s image, as did his infamous “shoot-to-kill” order shortly after the rioting following the assassination of Martin Luther King, Jr. This statement generated significant controversy; Daley’s supporters deluged his office with grateful letters and telegrams (nearly 4,500 according to Time magazine), and it has been credited for Chicago’s being one of the cities least affected by the riots.

Refused Affirmative Action Procedures in Police

Build University of Illinois at Chicago

CPS’s Racially Exclusionary Policies
Public Housing for Black
He used urban renewal funds to erect massive public housing projects that kept black Chicagoans within existing ghettos.

The First Environmental-affairs Department
Among the changes he made to the city’s government was creating its first environmental-affairs department under the management of longtime Great Lakes environmentalist Lee Bots.

Creating the Ethics Commission
Issued an executive order increasing minority business contracts
Led fight for ward redistricting; more black and Hispanic representation

Public Service Equalization
Fought for equal provision of public services; neighborhood street, curb and gutter repair

1968 Chicago Race Riots
The 1968 Chicago riots were sparked by the assassination of Dr. Martin Luther King, Jr. Rioters and police in Chicago were particularly aggressive, and the damage was severe. Of the 39 people who died, 34 were black.

1950s-1970s
Richard J. Daley

1968-1973
Richard J. Daley

1973-1983
Harold Washington

1983-1989
Harold Washington

1987 Teacher Strike 19 days
1988 Chicago School Reform Act
Illinois legislature passes the Chicago School Reform Act, which creates the local school council system in place today and initiates a period of aggressive reform.

1983-1987 Council War
Washington’s first term in office was characterized by ugly, racially polarized battles, dubbed “Council War”, referring to the then-recent Star Wars films, A 29-21 City Council majority refused to enact Washington’s reform legislation and prevented him from appointing reform nominees to boards and commissions.

1986 Education Summit
In 1986, Mayor Harold Washington convened an education summit that became the impetus for 25 years of reform—in three eras, identified by the Consortium on Chicago School Research.

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POLITICAL TIMELINE

1968 Chicago Race Riots
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1969 Tax Cut
Mayor’s first budget proposal, the 1969 budget, included $3 billion in spending, $50 million more than 1968. Featured a $25 billion reduction in the property tax levy, extended Mayor’s hiring freeze, planted recycling, and privatized the City’s truck fleet.

1990s-1991 Tax Cut

1995 Take Control of CPS
Mayor wins authority to appoint CPS management team and school board. Paul Vallas becomes the first CPS CEO.

2003 Meigs Field Airport Turned to a Park

2007-2009 Olympic Bid & Labor Union Contract
In 2007 Daley entered into ten-year contracts with the city’s labor unions to preclude labor unrest as Chicago launched a bid to host the 2016 Summer Olympic Games. (147)-(148) For months in 2009, Daley promoted the economic benefits of the proposal to the city and corporate community. Failed

2008 Real Estate Transfer Tax Increase
On January 1, 2008, the Chicago City Council approved, by a 41-6 vote, an increase in the city’s real estate transfer tax to bail out the Chicago Transit Authority.

2008 More Leases of Infrastructure
In September 2008, Chicago accepted a $2.52 billion bid to lease Midway International Airport for 99 years to a group of private bidders that included Culligan. The Midway deal fell through when the private bidders were unable to secure adequate financing.

2011 Government Budget Cuts

2009-2010 Richard M. Daley

2010 Gun Control
May 2010, Daley held a press conference to address gun control and a pending possible adverse decision in McDonald v. Chicago.

2011 High School Closing & CPS Reform
The mayor lengthened the school day for Chicago’s elementary and high school students, reorganized the city’s enormous system of community colleges to emphasize job-skills training. After reading in the Wall Street Journal about IBM’s plans to create a six-year high school curriculum heavy in STEM subjects—science, technology, engineering and math—Emanuel decided to adopt the idea, but at five schools. He is determined to steal Chicago’s leading universities into partnerships with local high schools.

2011-present Rahm Emanuel

2012 Rebuild Police Department
A new superintendent of police—Newark, N.J., police commissioner Gary McCarthy, a Bronx-born veteran of the New York City police and a disciple of the law-enforcement guru William Bratton—reintegrated policing with the needs and priorities of communities.

2012 Gun Control & Public Safety
Take action to address gun violence Reduce summer violence, especially among youth Coordinate public safety efforts more effectively

2012 Environment & Sustainability
Create a world-class bike network and increase cycling

2012 Infrastructure Development
Develop the city’s transportation system

2012 Teacher Strike
Among the major issues, the teachers are negotiating over the length of the school day, objecting to their evaluations being tied to performance and fretting about potential job losses.

1999 Police Abuse
In October 1999 the organization issued a report “Summary of Amnesty International’s concerns on police abuse in Chicago” which expressed concerns regarding improper tactics during questioning, the detention and interrogations of children, allegations of excessive force, shooting of unarmed suspects, and the lack of any external oversight of police complaints and disciplinary procedures.

2002 Rubber Stamp Council Even More
By 2002, more than a third of the Council’s 50 aldermen were appointed under Richard Daley’s “City Council by Design” program.

2006 Long-term Leases of Infrastructure
In January 2006, Skyway Concession Company, a joint venture between the Australian Macquarie Infrastructure Group and Spanish Cintra Concesiones de Infraestructuras de Transporte S.A., paid the City $1.83 billion for rights to operate the Chicago Skyway and collect tolls for 99 years. The deal was the first of its kind in the U.S.

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2002 Hired Truck Program scandal
The $40 million-a-year Hired Truck program was the biggest scandal of Daley’s first 13 years as mayor. The Hired Truck Program hired private truck companies to do city work. Some participating companies were being paid for doing little or no work. Had American Mafia connections or were tied to city employees, or paid bribes to get into the program.

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AMBITION
CHICAGO’S GOAL

- Eliminate food deserts in Chicago
  Our site is located in a food deserts

- Create a world-class bike network and increase cycling
  A bike path along Lake Michigan stops at the height of Lake Shore Drive South. There is no bike path from our site to the loop along Lake Michigan.

- Launch city-wide recycling
  Our site is not a blue cart area of the cities blue cart program that is started to help individuals recycle

- Improve water efficiency, water quality, and water infrastructure
  Water transportation good be an interesting opportunity for our site to make a connection with the Loop and Indiana.

More than 15 years ago, Mayor Richard M. Daley began to transform Chicago into the most environmentally friendly city in the nation. Today, Chicago is one of the world’s greenest and livable cities thanks to strong partnerships between government, residents and businesses.

“The Sustainable Chicago action plan offers concrete initiatives, metrics, and strategies aimed at advancing Chicago’s goal of becoming the most sustainable city in the country. From improving citywide energy efficiency and promoting diversified transit options, to launching citywide recycling, the roadmap is robust and comprehensive, touching upon the full spectrum of life for Chicagoans, whether at home, at work, on our streets or in our parks.”

Rahm Emanuel,
Mayor

Source: SUSTAINABLE CHICAGO 2015
AMBITION
CHICAGO’S GOAL

FIVE STR
Quinn approves landfill ban for Cook County
INDUSTRIAL ANCHOR
Why our site?

New jobs in South Chicago

Strong positioned infrastructure

New positive identity for South Chicago

Green structure

Fysic and visual connection with Lake Michigan

from
Steel production

↓

RECYCLE + REPRODUCE
engine
The presence of waste is an indication of over-consumption and that materials are not being used efficiently. This is carelessly reducing the Earth’s capacity to supply new raw materials in the future. The capacity of the natural environment to absorb and process these materials is also under stress. Valuable resources in the form of matter and energy are lost during waste disposal, requiring that a greater burden be placed on ecosystems to provide these.

The main problem is the sheer volume of waste being produced and how we deal with it.
‘Plastic constitutes a greater threat to India than a atomic bomb’

Said by the Indian Supreme Court
How do different countries dispose of their waste?

Source: http://geodata.grid.unep.ch/extras/posters.php

Recycling Rates Over Time
% Recycled for Select Materials

Source: http://greennature.com/article561.html
WASTE USA, ELECTRONICS

TOTAL WASTE STREAM
7,678,098 ANNUAL TONS OF WASTE GENERATED

CITYWIDE WASTE
3,012,061 TONS

CONSTRUCTION & DEMOLITION
4,666,037 TONS

CITYWIDE WASTE BREAKDOWN

BEVERAGE CONTAINERS
21,097 tons

HOUSEHOLD HAZARDOUS WASTE
69,825 tons

PAPER
1,029,255 tons

ORGANICS
773,652 tons

INORGANICS
28,278 tons

METAL
72,413 tons

GLASS
157,474 tons

TEXTILES
168,994 tons

CONSTRUCTION DEBRIS
307,991 tons

PLASTIC
333,580 tons

TOTAL ANNUAL CITYWIDE WASTE
3,012,061 TONS

Source: SUSTAINABLE CHICAGO 2015

WASTE CHICAGO
RESEARCH
CHICAGO RECYCLING

Old system
Single family homes
Multi-unit buildings with four or fewer units
Multi-unit buildings or high-rises
Commercial and industrial businesses

PRIVATE WASTE HAULERS

“The current system, based on ward boundaries, is no longer sustainable,” Mr. Emanuel said. “Chicago spends approximately $100 more per ton to collect garbage than L.A. and Boston. Now, I have a lot of pride in Chicago. But even I don’t think our garbage is more valuable than theirs.”

The big problem with Chicago is that it doesn’t have one system serving its 600,000 households. It has 50

Mr. Emanuel released his proposed 2012 city budget, which included $20 million in estimated savings through creation of more efficient trash collection routes.

By switching to a more efficient grid system and dropping to one laborer and one driver per truck, the city could do the same job with 25% fewer workers and save $40 million, said Joseph Ferguson, the city’s inspector general.

Source: http://online.wsj.com/articles/SB10001424052970203476804576612851452362670
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New system

Multi-unit buildings or high-rises
Commercial and industrial businesses

PRIVATE WASTE HAULERS

Single family homes
multi-unit buildings with four or fewer units

BLEU CARD RESIDENTIAL
RECYCLING PROGRAM

The new system does not offer its services to every resident, worker or visitor in Chicago


55% of waste to landfills
45% of waste recycled

Source: SUSTAINABLE CHICAGO 2015

Transport to landfills gives carbon emissions and are a missed opportunity ecologically as well as economically.
Recycling businesses in Chicago that work on national and international scale

Mostly focused on non-ferrous and scrap metal

Source: maps.google.com
Location: New York
Size: 11-acre
Built and operated by Sims Municipal Recycling

Source: http://www.simsmunicipal.com/NYC/Sunset-Park-MRF
RESEARCH
RECYCLING_CASE STUDIES

Location: County of Los Angeles
Size: 215,000 s.f.
Operator: Sanitation Districts of Los Angeles County
Wind power

Geothermal energy

Biomass

Biofuel

Hydropower

Solar power

CITYWIDE WASTE BREAKDOWN

BEVERAGE CONTAINERS 21,097 tons
HOUSEHOLD HAZARDOUS WASTE 69,825 tons
PAPER 1,029,255 tons
ORGANICS 773,652 tons
INORGANICS 26,278 tons
METAL 124,315 tons
GLASS 157,474 tons
TEXTILES 146,294 tons
CONSTRUCTION DEBRIS 307,991 tons
PLASTIC 333,580 tons
TOTAL ANNUAL CITYWIDE WASTE 3,012,061 TONS

TOTAL WASTE STREAM 7,678,098 ANNUAL TONS OF WASTE GENERATED

Non-hazardous, burnable municipal solid waste

Location: Southern California
Operator: The City of Commerce and the Sanitation Districts of Los Angeles County
20% of the world’s fresh water is on deposit in the Great Lakes

95% of the USA’ s fresh water is on deposit in the Great Lakes
Global climate change is an additional concern regarding freshwater resources. In particular, the UN panel warned that climate change could reduce water supplies in North America and conflicts between the U.S. and Canada on the water reserves. “So even in the Great Lakes region, global warming could create “more frequent droughts, urban flooding and a scramble for water.”
Designed by URBANLAB

Eco-Boulevard Anatomy

- High density live + work buildings cluster around terminal parks
- Renewable Energy Stations power Eco-Boulevards: Solar Arrays, Wind Turbines, Geothermal Wells
- Connect to existing parks, boulevards, and waterways
- LAKE
- Suburban Chicago to City of Chicago
- Living System Eco-Boulevard
transitional employment program in Chicago for those who face barriers to entering the work force.
Phase 2: involved the construction of a multi-purpose building that included a permanent attached greenhouse, processing and storage space, and rooms for offices and meetings.

Phase 3: The final phase of the project is intended to include green elements that will make the farm energy efficient, space, and rooms for offices and meetings.

Source: http://www.ryerson.ca/carrotcity
Get Growing Black Country and Birmingham, Smethwick, UK

Source: http://growinghomeinc.org/
Source: http://www.ryerson.ca/carrotcity
Source: http://chicagolakesidedevelopment.com/vision
RESEARCH INNOVATION STRATEGIES

SOUTH RECYCLE

ENERGY GRID

Renewable Electricity

Fuel Sources

Co-gen Plant

Lakeside

Lake Michigan

Heat Electricity

Cooling

Source: http://chicagolakesidedevelopment.com/innovation
MASTERPLAN
URBAN STRATEGIES PHASING

PHASE 1

INDUSTRIAL FACILITIES
FREIGHT STATION
HIGH SPEED RAIL STATION
BARGE TERMINAL

PHASE 2

EDUCATION
EXPO
VOCATION SCHOOL
MASTERPLAN
URBAN STRATEGIES PHASING

PHASE 5

PHASE 6

SPORTS, RECREATION ZONE
DWELLING

EXPANDING NEW IANCHOR TO
NORTH PART
LIGHT INDUSTRY
MASTERPLAN
URBAN STRATEGIES PHASING