Virtual City Deliverable: Sample Slideshow

Organization: ABC Middle School

Team Name: Trinity Point

Educator Name: Sarah Smith

(SimCity) City: Trinity Point

Region: Cape Trinity



Trinity Point Goals

GOAL	Corresponding SimCity Evidence	
1. Solid waste management & 4 Rs	 Complete (100%) trash collection Recycling center, 75% of citizens recycling 	
2. Public transit available to all Sims	 At least two types of public transit systems Integrated transit systems (working together to get Sims where they need to go) At least 50% of low- and med-wealth Sims using public transit 	

Phase I - Progress Report

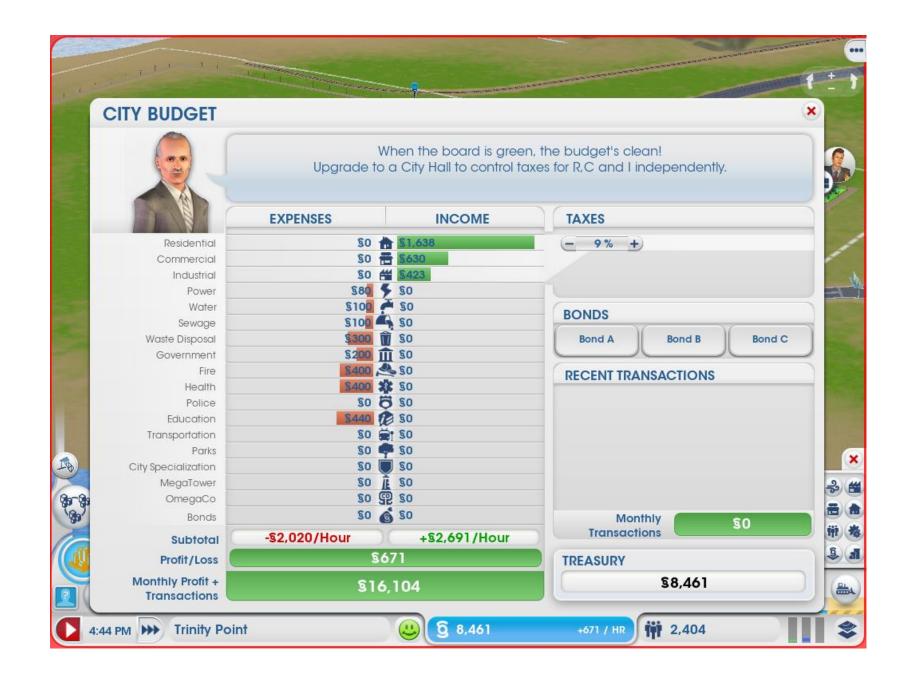
2500-5000 Sim citizens (suggested range)

City Zones screen shot

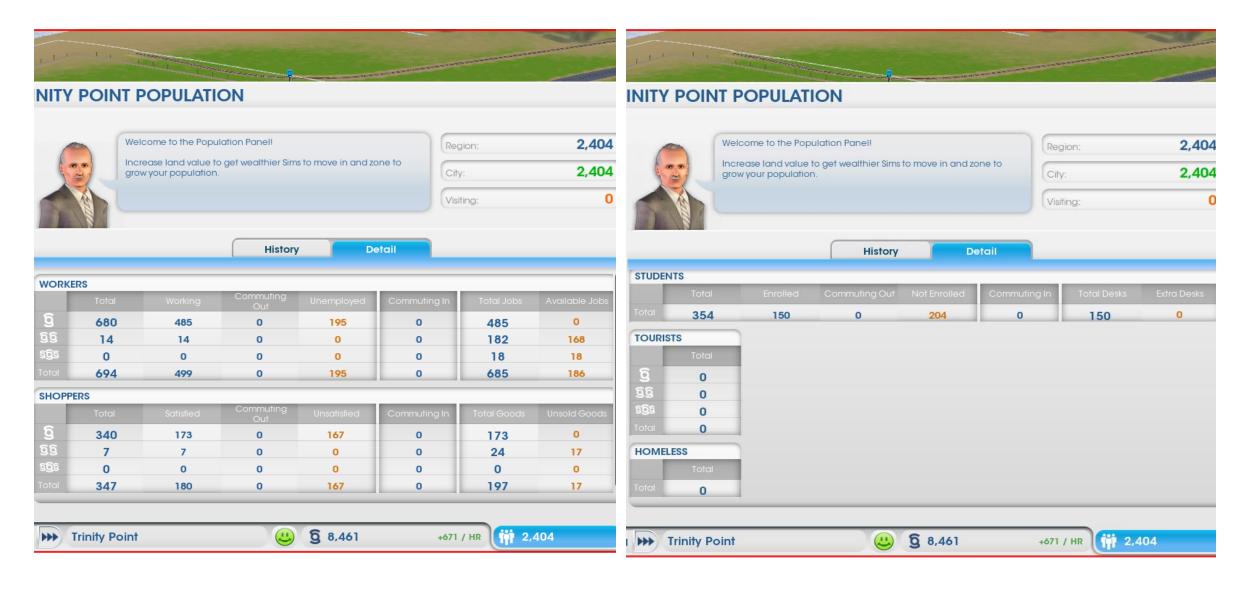
2,400 citizens



Budget (2,400 Sims)



Population detail (2,400 Sims)



Phase I: Benchmarks

City population	2400
Mayor rating	77%
Zoning, Development	R, C, & I; Low, med wealth; Low tech; Low, density
Services	Police – 0 Fire – 1 sm station Health – 1 sm clinic
Health & Safety	0 crimes, 0 criminal 3 fires, 3 bldg. burned 1 death
Utilities	Wind power Water tower Sewer outflow Garbage collect, landfill

Education	1 elem sch, 150 desks Ed. Level = 0 Enrollment 42%
Balanced budget	Yes, no cheats Tax rate = 9%
Public transit	None
Traffic congestion	None
Pollution	Air – none Water – none Ground – some from sewage outflow Radiation - none
Unemployment, homelessness	Unemploy = 8% Homeless = 0

Phase I: Progress Toward Goals

Goal	Corresponding SimCity Evidence Goal Is Achieved	Team Status	Team's evidence
Solid waste management & 4 Rs	 Complete (100%) trash collection Recycling center, 75% of citizens recycling 	Not startedx Needs improvementMade good progressComplete	100% Trash collection to landfillNo recycling center yet
Public transit available to all Sims	 At least 2 types of public transit systems, Integrated transit systems (working together to get Sims where they need to go) At least 50% of low- and med-wealth Sims using public transit 	x_Not startedNeeds improvementMade good progressComplete	 None yet Only low-traffic roads

Phase I: Strategies

Goal One: Solid waste management & 4 Rs

- Strategy 1: Expand the trash collection as city grows
- Strategy 2: Add recycling center when budget allows (but not in near future)

Goal Two: Public transit available to all Sims

- Strategy 1: Upgrade roads currently dirt and small paved roads in city
- Strategy 2: Add basic shuttle bus system when needed and budget allows

Phase II: Progress Report

5000-15,000 Sim citizens (suggested range)

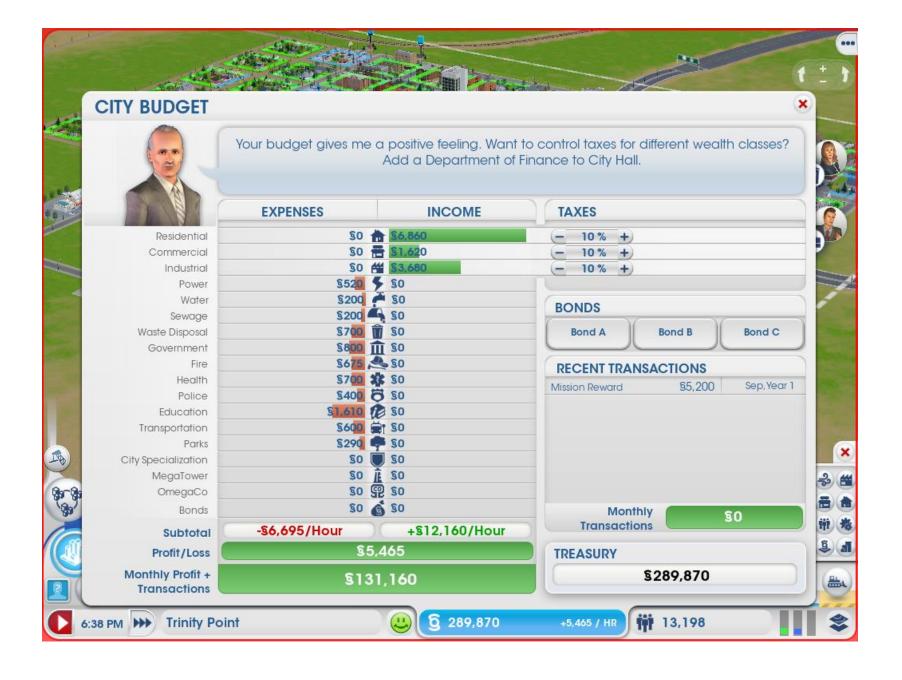
City Zones screen shot

13,000 citizens



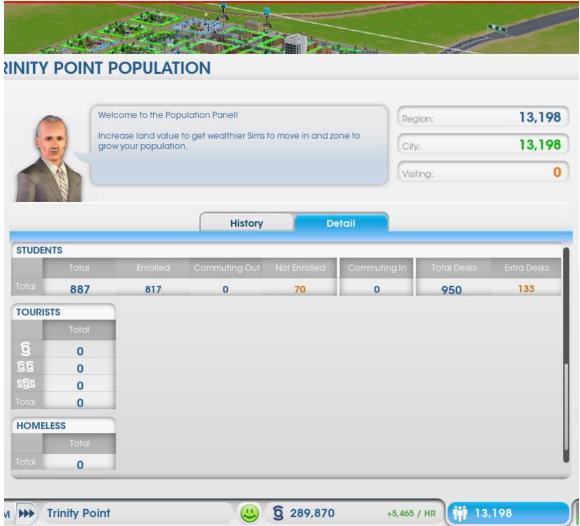
Budget

13,000 Sims



Population 13,000 Sims





Phase II: Benchmarks

City population	13198
Mayor rating	76%
Zoning, Development	R, C, & I; Low, med wealth; Low tech; Low, med density
Services	Police – 1 sm station Fire – 1 sm station Health – 1 sm clinic
Health & Safety	0 crimes, 4 criminal 2 fires, 0 bldg. burned 2 deaths
Utilities	Wind power Water towers Sewer outflow Garbage, incinerator

Education	1 elem sch, 950 desks Ed. Level = 1 Enrollment 92%
Balanced budget	Yes, no cheats Tax rate = 10%
Public transit	Shuttle bus
Traffic congestion	Slight
Pollution	Air – light Water – some Ground – some from sewage outflow and dirty industry Radiation – none
Unemployment, homelessness	Unemploy = 0 Homeless = 0

Phase II: Progress Toward Goals

Goals	Corresponding SimCity Evidence Goal Is Achieved	Team Status	Team's Evidence
Solid waste management & 4 Rs	 Complete (100%) trash collection Recycling center, 75% of citizens recycling 	Not startedx_Needs improvementMade good progressComplete	80% Trash collection to landfill, incineratorNo recycling center yet
Public transit for all	 At least 2 types of public transit systems, integrated (working together to get Sims where they need to go) At least 50% of low- and med-wealth Sims using public transit 	Not startedx_Needs improvementMade good progressComplete	 Shuttle 1259 riders (10%), 31 minutes wait time

Phase II: Strategies

Goal One: Solid waste management & 4 Rs

- Strategy 1: Expand the trash collection as city grows
- Strategy2: Add pickup capacity, since we are leaving some cans uncollected
- Strategy 3: Add recycling center when budget allows

Goal Two: Public transit for all

- Strategy 1: Continue to upgrade roads throughout city
- Strategy 2: Add to basic shuttle bus system as needed
 - Stops in high use areas
 - Buses to improve service and shorten wait times
- Strategy 2: Add a second transit system either train or ferry
- Strategy 4: Connect second system to the bus network

Phase III -- Progress Report (final city)

> 15,000 Sim citizens (suggested range)

City Zones screen shot

59,000 citizens



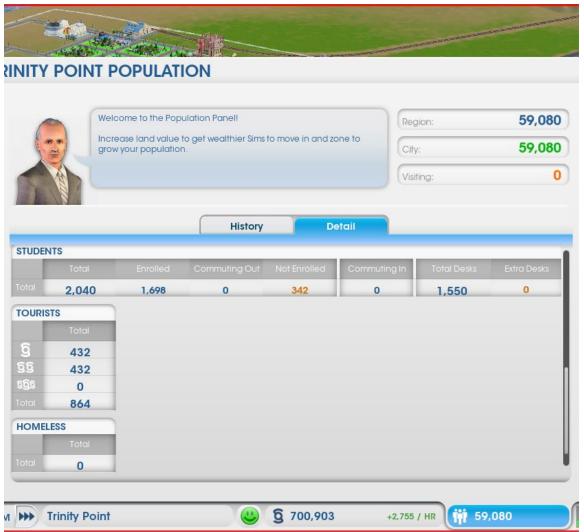
Budget

59,000 Sims



Population detail (59,000 Sims)





Phase III: Benchmarks

City population	59000
Mayor rating	83%
Zoning, Development	R, C, & I; Low, med wealth; Low, med tech; Low, med, hi density
Services	Police – 1 sm station Fire – 1 sm station Health – 2 sm clinic
Health & Safety	0 crimes, 1 criminal 0 fires, 2 bldg. burned 0 death
Utilities	Solar power, wind power Water pump Sewer treatment Garbage, incinerator Recycling plant

Education	1 elem sch, 550 desks Comm. College, 1000 stu Ed. Level = 3.5 Enrollment 83%
Balanced budget	Yes, no cheats Tax rate = 10%
Public transit	Shuttle bus, 33 min wait, 6800 riders; train, 17 min, 980 riders
Traffic congestion	Light
Pollution	Air – slight, decreasing Water & ground – some frm sewg outfl & dirty ind Radiation – none
Unemployment, homelessness	Unemploy = 0% Homeless = 0

Phase III: Progress Toward Goals

Goal	Corresponding SimCity Evidence Goal Is Achieved	Team's Status	Team's Evidence
Solid waste management & 4 Rs	 Complete (100%) trash collection Recycling center, 75% of citizens recycling 	Not startedx_Needs improvementMade good progressComplete	 60% Trash collection to landfill, incinerator Recycling, 4%
Public transit available for all Sims	 At least 2 types of public transit systems, integrated (working together to get Sims where they need to go) At least 50% of low- and med-wealth Sims using public transit 	Not startedx_Needs improvementMade good progressComplete	 Shuttle: 6,800 riders (11%), 33 min wait time Train: 980 riders, 17minutes wait time Bus stops at train station

Evaluation of Overall Progress on Goals

- Solid waste management & 4 Rs
 - Infrastructure is in-place, but needs improvement
 - Expand the garbage collection to pick up 100% of cans
 - Recycling center working and producing plastic and alloy materials for sale on global market
- Public transit for all
 - Continue to upgrade roads throughout city
 - Add to basic shuttle bus system as needed
 - May add higher capacity bus system as small shuttle nears maximum
 - Increase number of Sims using system by locating stops in dense population areas
 - Train station adds transportation outside of city, connected to bus network
 - Possibly add a ferry dock for a second inter-city transit option

Conclusion: Learning Outcomes

- What we learned
 - It costs money to put in a public transit system, but it is also costs money to keep upgrading roads to handle more and more personal cars
 - Transit goal for number of riders is hard to achieve
 - Where you place the bus stops is important need to put them where people want to go
 - All city services and utilities work together to create a city that people want to live in
 - You can't afford to ignore any service or utility for very long
 - But, you must plan for new or increased services and not over-spend your budget
 - It is important to understand what attracts the type of citizens (wealth level) and industry/companies (tech level) we want for our city
 - So that the type of (wealth-level) jobs and shopping matches the type of Sims living in city

Conclusion: Engineering Design Process

- What we learned
 - SimCity

Conclusion: Applying SimCity to other Future City Deliverables

- What we learned
 - SimCity has only basic transportation options
 - For a Future City we will need <u>future</u> transportation like flying cars and transporters
 - To get large number of citizens using public transit, we need to focus on mass transit (like monorails) rather than individual/personal transportation options (like flying cars)
 - This also means that people will be walking to/from transit stations, so a moving sidewalk, or something similar would be useful
 - SimCity does not have many options for the 4Rs
 - We are exploring many more possible processes for solid waste handling for our essay such as: Composting, Waste-to-energy conversion, Recovering materials from e-waste