

# City Build Challenge

The City Build is a hands-on experience for K-8 youth to use recycled, recyclable, and crafting materials to build a model of their own community 20-30 years in the future. Students will work with peers, near-peer student leaders in high school or college, afterschool staff, and local experts when available to envision what they want their city to look like. They will be introduced to challenges they will face like climate change, resource depletion, evolving community needs, and many others. The City Build will challenge students to be creative and innovative while taking ownership of the future of their city.

# Roles

# **Program Staff**

Materials Manager – will organize and distribute building materials

<u>City Inspector</u> – will provide guidance and support to students after each challenge is announced

#### Student workers and mentors

City Planners – will work directly with assigned student groups to assist ideas and building

# Students

Citizens – students are the next generation of their city and should take ownership as citizens

# Draft Agenda

This assumes an afterschool activity format from 4-6pm with greatest engagement from 4-5:30 for 2 consecutive days (although City Build can also be a weekend, at-home, or full-day format).

#### Day 1

3:00 – UNL Honors should arrive here and begin to set up.

- Lay out 15-20 stations (depending on material availability and anticipated student numbers).
   Each station should have brainstorming materials (paper, pencils, markers, etc.) and building tools (Make-Do tools).
  - o Split into two rooms on either side of kitchen in the Large Islander Cafe
- Lay out 2-3 main tables with construction materials (cardboard, construction paper, string, recycled bottles, etc.) and limited building tools (to be checked out or only handed to HS / College students i.e., sharp / heavy-duty scissors)
  - 2 tables in the bigger room 1 in the smaller



# 4:00 - Students arrive, activity begins

- Introduce City Build challenge and ideas to students.
- Empower students with their roles in the community now and in the future.

# 4:10 - Break students up into groups of 3-4 "citizens" + 1-2 "City Planners".

- Each group should begin to discuss their ideas with the City Planner(s).
- City planners should document group ideas and help guide students to solve a problem or address a community need that will improve their future community.
- City Planners can use their phones and/or laptops to search for and show students images and videos of creative projects relating to student ideas.

# 4:25 – Begin handing out materials // have students begin

 Have 1-2 groups at a time go to each materials table and grab their building supplies (depending on quantity, encourage students to take only what they can use in the next 30 minutes – they can come back for more later)

### **5:00** – News Agent will announce the first Newsflash: Heat Wave.

- See announcement in following section.
- City Planners can use their phones and/or laptops to find images and videos for inspiration

## 5:30 – City Planners begin to help students wrap up Day 1.

- Make sure student projects have names on them and are safe from being stepped on or broken. Talk to students about their plans for tomorrow – what else do they need to do? Does their current project protect against heat waves? What improvements can they make?
- Clean up all scraps, extra building materials, and put away building tools.
  - City Planners should guide students to think through materials going to the reuse bin, recycle bin, or landfill bin.
- Begin to move student projects from Large Island Café to rooms 1000-1002. This is where the final city will be put together on Day 2

#### **6:00** – End City Build Day 1.

# Day 2

#### 4:00 – Students arrive.

- Students go to their groups and review yesterday's brainstorm plans, ideas, and events.
- City Planners can help students think through potential changes, updates, or ideas to continue building.
- Tell students an announcement is coming in 30 minutes
- Students resume building

#### 4:30 - City Inspection Announced



# nebraska**children**

- Tell students that City Inspectors are coming to see if their projects will meet the challenge of protecting against heat waves.
- Inspectors walk around to give supportive feedback on student builds
- Students continue building

#### 5:00 - Town Hall

 Students need to begin to think about connecting their future city. Have groups talk to neighboring groups and share what they are building. Students should begin to think about how they will connect the city to finish the City Build 2040

### 5:30 – Begin to bring student projects together on Mainstreet or in Downtown area.

- Depending on space and time, assign each student group a "city block" in a city grid (downtown) or on "Mainstreet".
- Allow students to see where their projects will go and decide as a group who's buildings go
  where within their designated block. This may help organize the move and help prevent any
  mishaps. Allow for flexibility in student project size.

# 5:40 - City Inspector announces end of the City Build

- Students should move their projects to "Mainstreet" or "Downtown"
- Begin clean-up of all materials that are not needed in the final city all scraps, extra building materials, and all tools.
  - City Planners should guide students to think through materials going to the reuse bin, recycle bin, or landfill bin.

## 6:00 - End City Build portion of Day 2.

- Students can stand by their projects and present as families and community members come in
- Families and their students can go to dinner line as they finish their "tour" of the city
- City projects will be left in room 1001 for the next few days to allow families and community members who were unable to attend to see the project.



# Newsflash scripts

#### **Heat Wave**

Local Meteorologists are predicting a massive heat wave in the coming weeks. With temperatures consistently above 105 degrees, people, wildlife, and infrastructure will be threatened. Incorporate shade, technology, and design into your city to help reduce the heat index and minimize electricity use of air conditioners.

# Drought

The previous heat wave has persisted, and a local drought is building. Local water supplies are being strained by excessive water use threatening human use and critical habitats. Consider ways to reduce water use in your city through regulations as well as technology, building design, and new and innovative ideas.

## **Biodiversity Loss**

Local scientist have just released an alarming report that local pollinators, birds, and other wildlife are in drastically low numbers. The report points to a loss of habitat and extreme weather as two main factors causing the loss of wildlife. All future cities will need to design ways to support and care for local wildlife with green spaces, pollinator habitat, nature preserves, and other natural spaces.

### Flood warning

Scientists have predicted heavy floods in early spring as snow and ice melts quickly when the weather warms. Citizens must come together to prepare for flooding in the near future by protecting the city as a whole. Future cities will be able to address floods through things like restored wetlands to absorb water, levies that will protect the most flood-prone areas, canals to disperse water from cities in clean and safe ways, and many other ways. This challenge must be addressed by all citizens because flooding in one part of the community will affect the whole community. The solution to this challenge can also incorporate community spaces and services that will help provide health and wellbeing in the face of natural disasters.