

Lesson #2

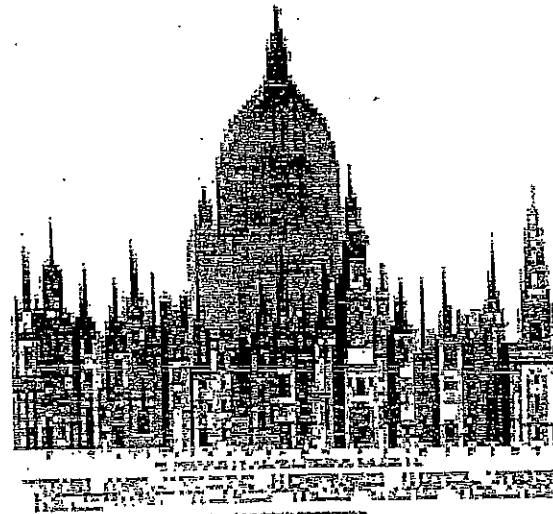
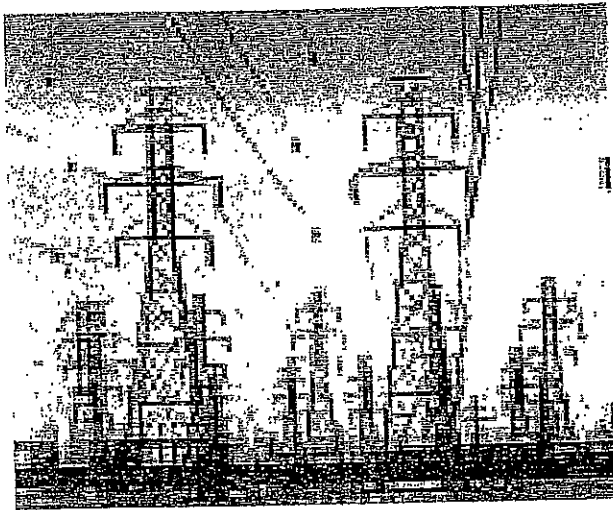
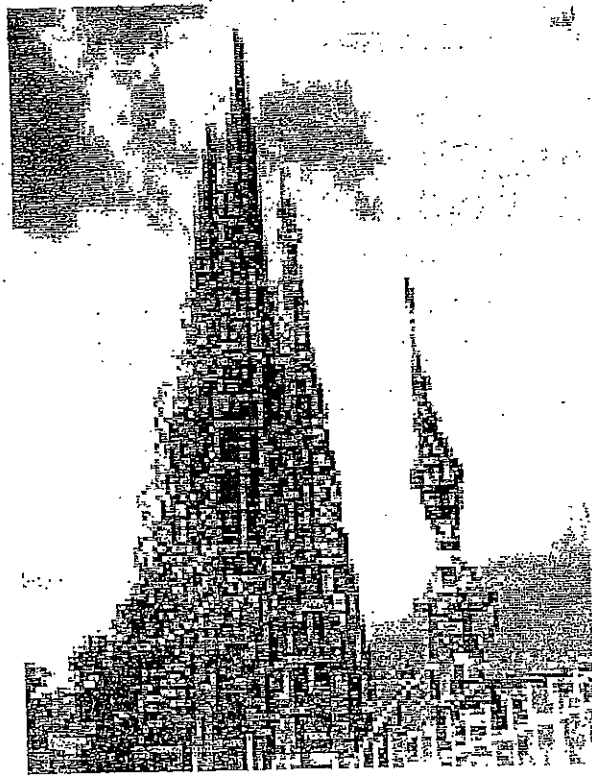
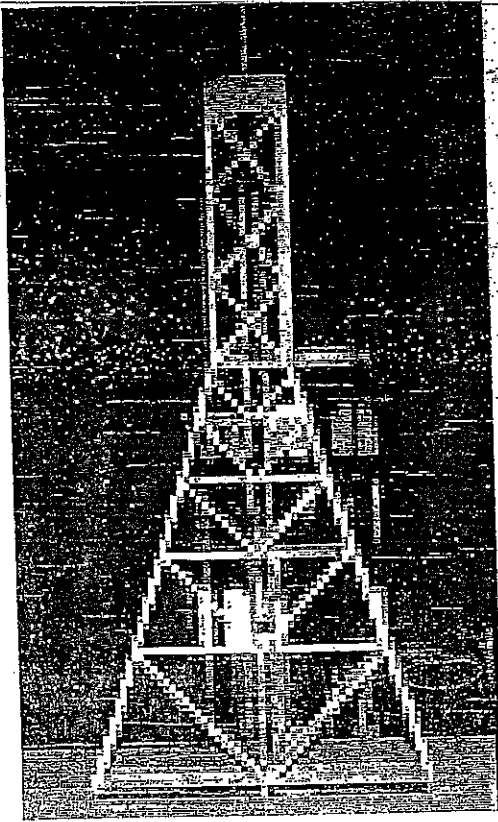
## The High Rise Fertilizer Tower



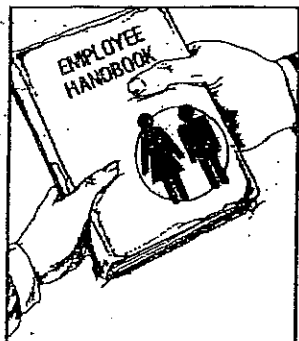
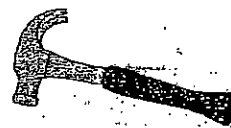
# ENGINEERS

WANTED BY

# THREE STAR TOWER COMPANY



## The High Rise Fertilizer Tower

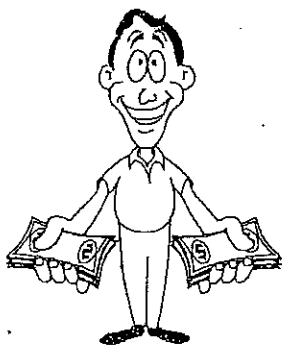
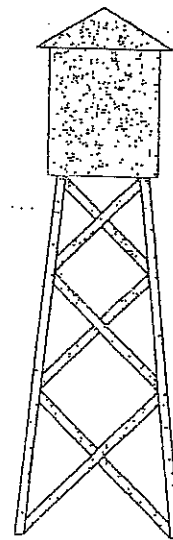


# The Job Description

## The Task

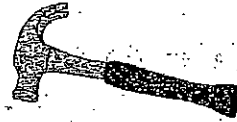
Design and build a High Rise Tower which will Support a Fertilizer container.

- ♦ The tower must be 45 cm. tall, not including the fertilizer container.
- ♦ The tower must be stable in windy weather.
- ♦ The tower must be able to support the fertilizer container filled with 125 ml. of fertilizer.
- ♦ The tower must use triangles in its design.
- ♦ The fertilizer container must be designed with a floor and a roof.
- ♦ The fertilizer container must be 10 cm. to 12 cm. tall.
- ♦ The fertilizer container must be securely attached to the tower.
- ♦ The total cost of the materials, including the mandatory rental of test materials, must be less than \$500,000.



All materials *must* be purchased from  
"The Canadian Super Suppliers".

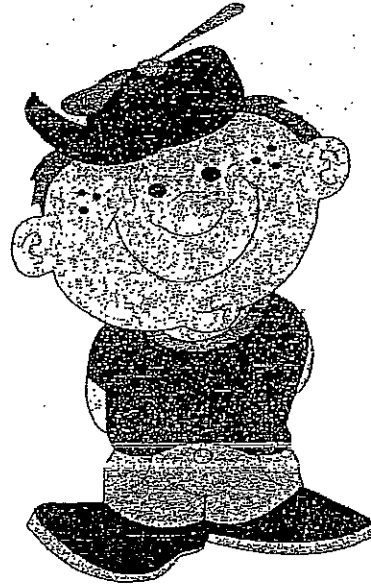
# The High Rise Fertilizer Tower



## The Plan

How you will make your fertilizer tower.

### Materials That I Think I Will Use

The plan to make my tower strong and stable.

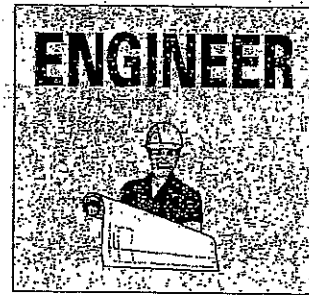

## The High Rise Fertilizer Tower



### The Diagram of my Project

Draw a diagram of your high rise fertilizer tower.

Label the tower with the materials that you plan to use.



A large, empty rectangular box intended for the student to draw their diagram of the high rise fertilizer tower and label it with materials.

# The High Rise Fertilizer Tower



## The Canadian Super Suppliers Price List

Item	Unit price
plastic straws	500.00
pipe cleaners	100.00
manilla tag paper/sheet	100.00
paper clips	50.00
gussets	50.00
glue gun rental/day	500.00
glue sticks	100.00
white glue/day	200.00
string/meter	100.00
sugar cubes	10.00
tooth picks	100.00
popsicle sticks	1000.00
plastic yogurt container	400.00
toilet paper tube	800.00
Rental of Test Materials	600.00

# The High Rise Fertilizer Tower



## Order the Materials



Quantity	Item	Cost
1	Rent of Test Materials	600.00
<b>Total Cost</b>		

**Please Note:**  
 Items may be exchanged.  
 All unused items may be returned for credit.

# The High-Rise-Fertilizer Tower



Collect Your Materials  
and  
Begin to Build  
Your  
High Rise Fertilizer Tower



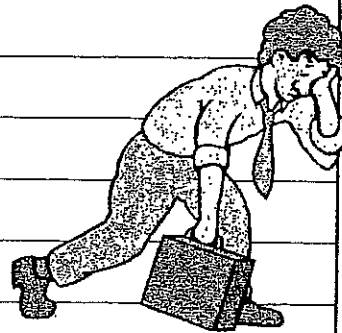
At the end of each day, make notes about your project. Include ideas that worked well, plans that you had to change, and additional materials that you needed to order.



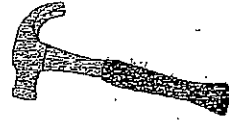

# The High Rise Fertilizer Tower



Continue to make notes about your construction.



# The High Rise Fertilizer Tower



## Testing the High Rise Fertilizer Tower

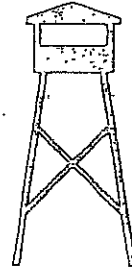


Is the tower 45 cm. tall?	
Is the tower stable in windy weather?	
Does the tower have a fertilizer container?	
Is the container 10 to 12 cm. tall?	
Is the container secured to the tower?	
Does the tower have triangles in its design?	
Does the fertilizer hold 125 ml. of sand?	
Does the container have a roof?	
Does the container have a floor?	
Did the project cost less than \$500,000	
Is the booklet done neatly?	
Is the project done on time?	

# The High Rise Fertilizer Tower



## Thinking Back



What do you like the best about your project?

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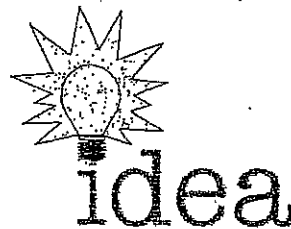
What part of the job was the hardest for you?

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If you could start over, what would you do differently?



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