| Opening Checklist (15 points) | Initials |  |
| :---: | :---: | :---: |
| 1. I had my math notes folder and daily papers ON MY DESK by the time class began. | $/ 5$ |  |
| 2. I had been using a SHARPENED pencil by the time class began. | $/ 5$ |  |
| 3. I had FINISHED copying the objective and had STARTED defining the Word of the <br> Day by the time class began. |  |  |

Do Now (10 points) - Copy the Objective and define the Word of the Day.
Initials
Obj:

Word of
the Day
\& Defn:


Skill Review (10 points) - Show ALL work necessary. Initials

| Notes/Activity (20 points) | Initials |  |
| :--- | ---: | ---: |
| Completed Notes Page/Activity | $/ 10$ |  |
| Participated Productively \& Earned the Appropriate Number of Teacher Checkmarks | $/ 10$ |  |
| Exit Ticket (10 points) - Complete INDEPENDENTLY and SILENTLY. |  |  |
|  |  |  |

Practice ( 30 points)
Graph the parabola.

1) $y=-\frac{1}{2} x^{2}$

| $x$ |  | $y$ | $f(x)=y$ | $(x, y)$ |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |
|  |  |  |  |  |
|  |  |  |  |  |




What is the order, from widest to narrowest, of the graphs of the functions? Tell the direction each graph opens.
3) $\quad f(x)=-x^{2} \quad f(x)=3 x^{2} \quad f(x)=-\frac{1}{3} x^{2}$
4) $\quad f(x)=-4 x^{2} \quad f(x)=\frac{1}{4} x^{2} \quad f(x)=x^{2}$

Three graphs are shown at the right. Identify the graph or graphs that fit each description.
5) $\quad a>0$
6) $\quad|a|$ has greatest value
7) $\quad|a|$ has least value
8) $a<0$


Sketch and label 2 graphs with the following descriptions on the same axes.
9) Opens upward and wider than the graph of $f(x)=x^{2}$
10) Opens downward and narrower than the graph of $f(x)=x^{2}$


## Exit Ticket

Describe the width and opening direction of the graph of each function.
Sketch and label the graphs of the functions on the same graph.

1) $y=5 x^{2}$
2) $y=-\frac{1}{5} x^{2}$
