

To Guthrie Junior High Students, Parents, & Guardians,

The 8<sup>th</sup> grade, Pre-Algebra, curriculum is established by the Oklahoma Academic Standards for Mathematics. Each Proficiency Scale and every activity and assessment we completed this school year can be found as a portion of one or more of the standards. In our planning of the course work for the school year, we organized our time to teach, practice and assess each of those standards in the first three quarter. This leaves the fourth nine-week period for an overall review of the standards.

Therefore, all 8<sup>th</sup> grade students received instruction required by the State prior to our break. The packet to follow is a basic review of each substandard. Each daily activity is labeled by date and substandard being reviewed. Students will be familiar with the concepts but may need to use the notes attached to the daily activity with the answers for assistance. There is also an 8<sup>th</sup> Grade Mathematics Formula Sheet that will be a valuable resource throughout. Students are encouraged to continue using the technology of a scientific calculator as we practiced using in our class work.

The following websites are appropriate for aiding in review if needed. Some of these may have been used in FLEX or extra assistance throughout the year. They are not essential to the success but may be helpful.

### **Quality Free Online Learning Videos**

<https://mashupmath.com>

<https://www.mathantics.com>

<http://mathvids.com>

<https://www.khanacademy.org>

<https://www.pbslearningmedia.org>

eHowEducation (via youtube)

Dylan Peters EDU (creative videos via youtube)

CrashCourse (via youtube type in math in the search menu)

### **GJHS 8<sup>th</sup> grade Mathematic Teachers**

*Adam Dement, Kristin Hooper, Shurlyn Maltz, & Audrey Rose*

To be used when needed on all activities.

Oklahoma State Testing Program  
8<sup>th</sup> Grade Mathematics Formula Sheet

UNIT CONVERSIONS

1 foot = 12 inches

1 pound = 16 ounces

1 cup = 8 fluid ounces

1 yard = 3 feet

1 ton = 2000 pounds

1 pint = 2 cups

1 mile = 5280 feet

1 kilogram = 1000 grams

1 quart = 2 pints

1 mile = 1760 yards

1 gallon = 4 quarts

1 meter = 100 centimeters

1 meter = 1000 millimeters

AREA

Square  $A = s^2$

Parallelogram  $A = bh$

Rectangle  $A = lw$

Circle  $A = \pi r^2$

Triangle  $A = \frac{1}{2}bh$

Trapezoid  $A = \frac{1}{2}(b_1 + b_2)h$

CIRCUMFERENCE

Circle  $C = \pi d$  or  $C = 2\pi r$

VOLUME

Rectangular Prism  $V = Bh$  or  $V = lwh$

Right Cylinder  $V = Bh$  or  $V = \pi r^2 h$

SURFACE AREA

Rectangular Prism  $S = 2B + Ph$  or  $S = 2lw + 2lh + 2wh$

Cylinder  $S = 2\pi rh + 2\pi r^2$

LINEAR EQUATIONS

Slope-intercept  $y = mx + b$

Direct Variation  $y = kx$

Slope formula  $m = \frac{y_2 - y_1}{x_2 - x_1}$

OTHER

$d = rt$

Pythagorean Theorem  $a^2 + b^2 = c^2$

