

The Curriculum Matrix is based on the twelve areas of the National Council of Teachers Mathematics standards. The areas are Algebra, Data Interpretation, Decimals, Fractions, Functions, Geometry, Mathematics Process, Measurement, Number Theory, Numeration Technology, and Whole Numbers.

Each area of the standard, labeled a strand, is defined, competencies identified, and specific skills that address the competency listed for each level.

ALGEBRA		
Readiness	TEKS	7/H
Missing numbers and number sentences		
Order of Operations	7.1B,C,G;7.2;7.3A,B	7
Multiple steps (see Mathematical Process)		
Number line		
- whole numbers		
Exponents and powers	7.1B,C,D;7.2;7.3A,B	8
Scientific Notation		
- positive powers of 10	7.1B,C;7.2;7.3A,B	9
- negative power of 10		
Squares and square roots	7.1B,C,G	10
Operations		7/H
Variables	7.1A,C,G;7.11A,B	11
Writing equations	7.10A,B	12,13,14
Integers (Negative/Positive)		
- define	7.1C,D	15
- compare/order	7.1C,D,E	16
- addition/subtraction	7.1B,C;7.3A	17
- multiplication/division	7.1B,C;7.3A	18
Solve 1 step equations		
- addition/subtraction	7.1B,C;7.3B	19
- multiplication/division	7.1B,C;7.3B	20
- input/output table	7.1B,C;7.3B	21

Solve 2 step equations	7.1A,B,C;7.11A	22
Solve equations with 2 variables	7.1,B,C,D;7.11A	23
Inequalities	7.1B,C,D,G;7.10B	24
Formulas	7.1C,D,G;7.4A	25
Rational Numbers - identify and simplify		
Polynomials		
- represent and simplify		
- adding		
- subtracting		
-multiplying monomials and binomials		
- factoring		
Coordinate Graphing		
- coordinates in four quadrants	7.1C,D	26
- equations (See Functions)		
- inequalities		
- slope		
DATA INTERPRETATION		
Readiness		7/H
Pictographs	7.1A,B,C,D;7.2;7.3A,B	27
Bar graphs	7.1C,D;7.6F	28
Line graphs	7.1C,D;7.6F	29
Line plots	7.1C,D;7.6F	30
Double line graphs	7.1C,D;7.6F	31
Circle graphs	7.1C,D;7.6G	32
Stem and leaf diagrams		33
Box diagrams (Box And Whisker)	7.1C,D;7.12A	34
Scatter plots	7.1C,D;7.12A	35
Collection		7/H
Tally charts		
Tally chart and frequency distribution	7.1D,7.4A,7.6G	36
Range, mode, median, mean	7.1C,F,G;7.3A	37

Sampling	7.1A,7.12A,C	38
Probability		7/H
Predicting outcomes	7.1A,7.12C	39
Probabilities	7.1A,7.12C	40

DECIMALS

Concepts		7/H
Meaning of decimals		
Compare/order	7.1B,C,F,G;7.2;7.3A	41
Related to fractions	7.1B,C,F,G;7.2;7.3A	42
Related to percent	7.1B,C,F,G;7.2;7.3A	43
Related to money		
Place value	7.1A,D;7.2	44
Rounding	7.1A,B,C;7.2	45
Operations		7/H
Addition	7.2;7.3A	46
Subtraction	7.2;7.3A	47
Multiplication	7.2;7.3A	48
Division		
- whole number divisor	7.2;7.3A	49
- decimal divisor	7.2;7.3A	50
- repeating decimals/terminating decimals	7.2;7.3A	51
Estimating	7.1A,B,C;7.2;7.3B	53

FRACTIONS

Concepts		7/H
Part of a whole/part of a set		
Lowest terms/simplest form	7.1A,B,C;7.3A,B	54
Comparing and ordering	7.1A,C,D	55
Rounding/estimating	7.1C	56
Related to decimals	7.1C;7.3A,B	57
Related to percent	7.1A,B,C;7.4D	58
Least Common Denominator (LCD)	7.1C;7.2;7.3A,B	59

Equivalent fractions	7.1A,C,G;7.2;7.3A,B	60
Mixed numbers		
- related to improper fractions	7.1C,G;7.2;7.3A,B	61
Operations		7/H
Addition		
- like denominators	7.1A,B,C;7.2;7.3A,B	62
- unlike denominators	7.1A,B,C;7.2;7.3A,B	63
- mixed numbers	7.1A,B,C;7.2;7.3A,B	64
Subtraction		
- like denominators	7.1A,B,C;7.2;7.3A,B	65
- unlike denominators	7.1A,B,C;7.2;7.3A,B	66
- mixed numbers	7.1A,B,C;7.2;7.3A,B	67
- regrouping		
- mixed numbers with regrouping	7.1A,B,C;7.2;7.3A,B	68
Multiplication		
- simple fractions	7.1A,B,C;7.2;7.3A,B	69
- mixed numbers	7.1A,B,C;7.2;7.3A,B	70
- simplifying	7.1A,B,C;7.2;7.3A,B	71
Division		
- reciprocal	7.1A,B,C;7.2;7.3A,B	72,73
- whole numbers		
- mixed numbers	7.1A,B,C;7.2;7.3A,B	74
- solve equations	7.1A,B,C;7.2;7.3A,B	75
FUNCTIONS		
Relationships		7/H
Tables	7.1C,D;7.2;7.7	76,77
Ordered pairs	7.1C,D;7.2;7.7	78,79
Line graphs (See Data Interpretation)	7.1A,B,C;7.2,7.6G	29
Venn Diagrams	7.1A,B,C;7.2;7.6F,G	80,81
Graphing equations	7.1C,D;7.7	82
GEOMETRY		

Concepts		7/H
Segments/rays	7.1C,D	83
Angles		
- classify	7.1C,D	84
- measuring	7.1C,D	85
- complementary/supplementary	7.1C,D	86
- vertical/corresponding/alternative interior	7.1C,D	87
Lines		
- parallel		
- perpendicular		
- parallel & perpendicular	7.1C,D	88
- symmetry	7.1C,D	89
- skew	7.1C,D	90
Congruence	7.1C,D;7.5A	91
Sides, corners, vertices, edges	7.1C,D	92
Transformations (slides, turns, flips)	7.1C,D	93
Solid Shapes (sphere, cone, cylinder, cube, pyramid, prism)		7/H
Identify		
Sorting and Classifying		
Plane Shapes		7/H
Open and closed	7.1C,D	94
Polygons (quadrilaterals, square, pentagon, hexagon, octagon)	7.1C,D	95
Triangles		
- classify	7.1C,D	96
- congruent	7.1C,D;7.5A	97
Parallelogram	7.1C,D	98
Diagonals	7.1C,D	99
Demensional Shapes		7/H
Recognize by given specifications	7.1C,D;7.5A	100

Pythagorean Theorem	7.1B,C,D;7.5A	101
MATHEMATICAL PROCESS		
Problem Solving		7/H
Choose an operation	7.1A,B,C;7.2;7.3A,B	102,103
Multiple-step problems	7.1A,B,C;7.2;7.10A;7.11A	104,105
Using Estimation	7.1A,B,C;7.2	106,107
Make an organized list	7.1A,B,C	108
Make a table	7.1A,B,C,D,E;7.6D,E	109
Information - too much/too little	7.1A,B,C;7.2;7.3A,B	110
Reasoning		7/H
Sequencing		
Classifying	7.1B,C,D,F,G;7.2,7.7;7.10A,B,C	111
Compare/contrast	7.1A,B,C,F;7.6G	112
Generalizations	7.1B,C,G;7.2;7.3A,B	113
Drawing conclusions	7.1A,C;7.12C	114
Visual patterns (See Functions)	7.1A,B,C;7.6D	152
Reasoning	7.1C,D	115
Computation Strategies		7/H
multiply/divide by multiples and powers of 10	7.1B,C;7.3A,B	116
MEASUREMENT		
Length		7/H
Nonstandard units		
Standard units	7.1A,B,C;7.3A,B	117
Metric	7.1A,B,C;7.3A,B	118
Capacity		7/H
Nonstandard units		
Standard units	7.1A,B,C;7.3A,B	119
Metric	7.1A,B,C;7.3A,B	120
Weight		7/H
Nonstandard units		
Standard units	7.1A,B,C;7.3A,B	121

Metric	7.1A,B,C;7.3A,B	122
Converting Metrics	7.1A,B,C;7.3A,B;7.4E	123
Reasoning		7/H
Fahrenheit	7.1A,B,C,D	124
Celsius	7.1A,B,C	125
Convert	7.1A,B,C,G;7.2;7.3A,B;7.4E	126
Area - Volume		7/H
Perimeter	7.1C,D;7.2;7.3A,B	127
Area	7.1C,D;7.2;7.3A,B;7.5B	128,129
Volume	7.1A,C,D;7.5B;7.8A,B,C;7.9A,B	130
Surface Area	7.1C,D;7.5B;7.8A,B,C;7.9A,B	131
Circumference	7.1B,C,D,E;7.5B;7.8C	132
Circumference - Diameter/radius	7.1B,C,D,E;7.5B;7.8C	133
Time		7/H
Elapsed	7.1A,B,C	134
Clock		
Calendar		
Time zones	7.1A,B,C	135
Money		7/H
Identify coins		
Identify value		
Making change	7.1A,B,C,D,E	136
Value comparison		
NUMBER THEORY		
Number Sense		7/H
Counting		
Place value	7.1C;7.2;7.3A,B	137
Integers		
Greater than - less than	7.1C,E;7.2	138
Even and odd numbers		
Prime and composite numbers	7.1C,D,E	139

Prime factorizaion	71.C,D,E,G;7.2;7.3A,B	140
Divisibility	7.1B,C,D,E;7.2;7.3A,B	141
Factors and greatest common factors	71.C,D,E,G;7.2;7.3A,B	142
Multiples and least common multiples	71.C,D,E,G;7.2;7.3A,B	143
Ratio and Proportion		7/H
Ratios		
Equal ratios	71.A,B,C,D,E,G;7.2;7.3A,B;7.4D	144
Rate and unit price	71.A,B,C,D,E,G;7.2;7.3A,B;7.4D	145
Percent		7/H
Related to ratios	71.A,B,C,D,E,G;7.2;7.4D	146
Related to fractions/decimals	71.A,B,C;7.2;7.4D	147
Finding a percent of a number	7.1A,B,C;7.2;7.3A,B;7.4D;7.6C,E	148
Find what percent one number is of another	7.1A,B,C;7.2;7.3A,B;7.4D;7.6C,E	149
Find a number when a percent is known	7.1A,B,C;7.2;7.3A,B;7.4D;7.6C,E	150
Interest, discount, commission	7.1A,B,C,D,E,F,G;7.2;7.4D;7.13E,F	151

NUMERATION

Patterns		7/H
With objects/geometric figures		
With numbers	7.1A,B,C;7.6D	152
Skip counting		
Patterns		7/H
Meaning of numbers		
Reading and writing numbers	7.1C,D	153
Ordinal numbers		
Roman Numerals	7.1C,D,G	154
Estimation		7/H
Using front-end digits	7.1B.C.;7.2;7.3A,B	155
Rounding whole numbers/decimals	7.1C;7.2	156
Rounding fractions/mixed numbers	7.1C;7.2	157
Compatible numbers	7.1A,B,C;7.2;7.3A,B	158
Clustering	7.1C;7.2;7.3A,B	159

TECHNOLOGY		
Calculator		7/H
Whole number operation	7.1B,C;7.2;7.3A,B	160
Decimals/money	7.1A,B,C,D,E;7.2;7.3A,B;7.4B,D;7.13A,F	161
Fractions	7.1C,D,E	162
Percent	7.1C;7.2;7.3A,D;7.4D	163
WHOLE NUMBERS		
Addition		7/H
Vocabulary of addition		
Related to subtraction		
Fact families		
Basic facts and fact strategies		
Properties		
Three or more addends		
Adding 2-digit numbers		
- regrouping		
Adding 3-digit numbers		
- regrouping		
Adding with 4 or more digits		
- regrouping		
Estimation and mental math	7.1A,B,C;7.3A,B	164
Subtraction		7/H
Vocabulary of subtraction		
Related to addition		
Basic facts and fact strategies		
Subtracting 2-digit numbers		
- regrouping		
- with zeros		
Subtracting 3-digit numbers		
- regrouping		
- with zeros		

Subtracting with 4 or more digits		
- regrouping		
- with zeros		
Estimation and mental math	7.1A,B,C;7.3A,B	165
Multiplication		7/H
Vocabulary of multiplication		
Related to addition/division		
Basic facts and fact strategies		
Properties	7.1B,C;7.3A,B	166
By a 1-digit number		
By multiples of 10 or more	7.1B,C,G;7.2;7.3A,B	167
By a multi-digit number	7.1B,C;7.2;7.3A,B	168
Estimation and mental math	7.1A,B,C;7.3A,B	169
Division		7/H
Vocabulary of division		
Related to subtraction/multiplication		
Basic facts and fact strategies		
By a 1-digit divisor	7.1A,B,C,G;7.2;7.3A,B	170
By multiples of 10 and 100	7.1A,B,C,G;7.2;7.3A,B	171,172
By a multi-digit divisor	7.1A,B,C;7.2;7.3A,B	173
Estimation and mental math	7.1A,B,C;7.3A,B	174