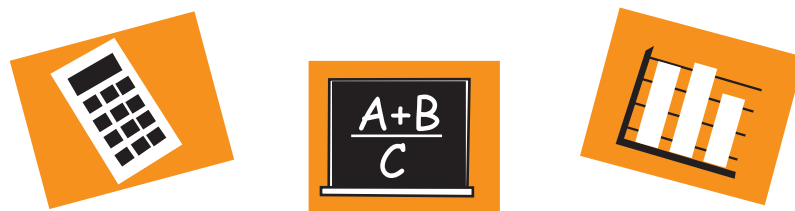


# Functional Independence

## Fall 2013



# Mathematics

## *Item Descriptors*

# Grade 6

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**DIRECTIONS:** Read each question. Choose the **BEST** answer for each question.

**NOTE: For each item listed throughout this booklet, the first statement is a summary of the Michigan Extended Grade Level Content Expectation (EGLCE) and the second statement or problem is the descriptor for the item's stem or question.**

- 1 N.MR.05.FI.EG10:** Find the next number in a simple repeating pattern

Describe addition pattern

- A** correct
- B** correct amount but subtracted
- C** added incorrect amount

- 2 N.MR.05.FI.EG09:** Create, describe, and extend simple number patterns

Given description, identify matching increasing pattern

- A** correct
- B** increasing pattern, but by incorrect amount
- C** increasing pattern, but by incorrect amount

- 3 M.UN.05.FI.EG01:** Select and use standard tools for measurement

Select tool to measure length

- A** tool to measure time
- B** correct
- C** tool to measure temperature

- 4 M.PS.05.FI.EG03:** Measure and compare integer temperatures

Use thermometer to measure temperature

- A** correct
- B** under by 4 degrees
- C** under by 2 degrees

**5 M.UN.05.FI.EG05:** Measure lengths to the nearest inch

Measure length to nearest inch

- A** under by one inch
- B** correct
- C** over by one inch

**6 M.UN.05.FI.EG02:** Select appropriate units of measure

Identify unit of measure for weight

- A** unit of measure for length
- B** unit of measure for time
- C** correct

**7 M.UN.05.FI.EG04:**  
Approximate temperature

Select temperature to match given context

- A** too cold
- B** too cold
- C** correct

**8 M.PS.05.FI.EG08:** Solve one-step word problems

Add increase to temperature

- A** subtracted
- B** incorrect addition
- C** correct

**9 N.ME.05.FI.EG08:** Identify and place whole numbers on a number line

Identify missing whole number on number line

- A** number one less than smallest value shown
- B** number one more than smallest value shown
- C** correct

**10 G.LO.05.FI.EG02:** Describe and use relative position of objects on a plane and in space

Determine relative position of two objects

- A** correct
- B** incorrect position
- C** incorrect position

- 11 D.RE.05.FI.EG03:** Describe the shape of data using informal language

Interpret trend of data in chart

- A** incorrect trend
- B** correct
- C** incorrect trend

- 12 M.UN.05.FI.EG07:** Tell time on a radial or digital clock to the nearest hour

Select radial clock to given temperature

- A** 2 hours earlier
- B** 1 hour earlier
- C** correct

- 13 M.PS.05.FI.EG11:** Tell the amount of money in dollars and cents

Determine decimal value of given bills and coins

- A** 5-dollar bill = \$1, 1 penny = 2 cents
- B** quarter = 10 cents, penny = 2 cents
- C** correct

- 14 M.UN.05.FI.EG09:** Identify and use different coins and bills

Given value in dollars and cents, identify matching set of bills and coins

- A** 1-dollar bill has value of five dollars
- B** 5-dollar bill has value of ten dollars and one nickel has the value of a quarter
- C** correct

- 15 M.UN.05.FI.EG10:** Recognize equivalent sets of coins and bills

Identify set of coins equivalent to given set

- A** correct
- B** 25 cents over
- C** 10 cents over

- 16 M.PS.05.FI.EG12:** Add and subtract money in dollars and cents

Subtract money in word problem

- A** 10 cents = \$1
- B** correct
- C** added

**17 N.ME.05.FI.EG03:** Represent whole numbers to 10,000

Represent 2-digit number with blocks

- A** transposed ones and tens
- B** correct
- C** correct tens, but did not include ones

**18 D.RE.05.FI.EG02:** Draw predictions and conclusions from data in tables, graphs, and charts

Interpret bar graph: find maximum value

- A** neither maximum nor minimum
- B** minimum, not maximum
- C** correct

**19 D.RE.05.FI.EG01:** Read data from charts, tables, graphs, tallies, and pictographs

Interpret bar graph

- A** incorrect bar
- B** correct
- C** incorrect bar

**20 N.ME.05.FI.EG02:** Recognize equivalent representations for whole numbers to 10,000

Translate standard form to expanded form

- A** correct
- B**  $a,bcd = a,000 + b0 + c0 + d$
- C**  $a,bcd = a + b + c + d$

**21 N.ME.05.FI.EG06:** Compare and order numbers to 10,000

Select 4-digit number greater than given 4-digit number

- A** less than the given number
- B** less than the given number
- C** correct

**22 N.ME.05.FI.EG01:** Read, write, and count using whole numbers to 10,000

Translate standard form to word form

- A** correct
- B** omitted tens
- C** incorrect in tens and ones place

- 23 N.MR.05.FI.EG13:** Solve simple open sentences for addition and subtraction

Find subtrahend in subtraction equation

- A** one less than correct subtrahend
- B** correct
- C** one more than correct subtrahend

- 24 N.ME.05.FI.EG05:** Express numbers to 10,000 using place value

Determine number with value in tens place

- A** correct
- B** ones place = tens place
- C** hundreds place = tens place

- 25 G.GS.05.FI.EG01:** Identify, describe, and compare two-dimensional shapes

Identify 2-D shape given name

- A** incorrect 2-D shape
- B** correct
- C** incorrect 2-D shape

- 26 N.ME.05.FI.EG08:** Identify and place whole numbers on a number line

Identify shape at given location on number line in increments of 5

- A** shape with location 10 less than correct location
- B** shape with location 20 less than correct location
- C** correct

- 27 N.ME.05.FI.EG02:** Recognize equivalent representations for whole numbers to 10,000

Translate standard form to expanded form

- A**  $a,bcd = a,000 + b00 + d0 + c$
- B** correct
- C**  $a,bcd = a,000 + c00 + b0 + d$



**28 N.FL.05.FI.EG11:** Use addition properties of 0

Add 0 to 2-digit number

- A correct
- B added 1
- C added 10

**29 M.PS.05.FI.EG06:** Measure and compare lengths, weights, and volumes

Compare heights in inches

- A correct
- B incorrect comparison
- C incorrect comparison

**30 N.ME.05.FI.EG07:** Count numbers to 10,000 by 1s and to 1,000 by 2s, 5s, 10s, and 100s

Count by 100s to find total

- A 500 less than total
- B 100 less than total
- C correct

**31 N.FL.05.FI.EG14:** Apply estimation in solving problems

Estimate addition in context

- A correct
- B overestimate
- C multiplied

**32 N.MR.05.FI.EG15:** Select appropriate numbers to solve problems

Select correct 2-digit addends and add

- A sum of first two addends
- B sum of second two addends
- C correct

**33 N.FL.05.FI.EG12:** Add and subtract two numbers with 1 or 2 digits each

Add in context

- A 10 under
- B correct
- C 10 over

**34 N.FL.05.FI.EG14:** Apply estimation in solving problems

Estimate cost in dollars

- A** underestimate by \$10
- B** correct
- C** overestimate by \$10

**35 N.FL.05.FI.EG12:** Add and subtract two numbers with 1 or 2 digits each

Subtract in context

- A** less than correct difference
- B** correct
- C** added





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