EIGHTH GRADE EXAMINATION

Questions prepared by the Superintendent of Public Instruction for the regular examination, May 8-9, 1919.

AGRICULTURE

1. Name the four types of soil found in Michigan.
2. Describe how you would prepare a seed bed for the growing of carrots.
3. Name the vegetables a farmer should grow in his garden.
4. Name the fruits a farmer should grow in his garden.
5. Explain how you could plan a bed of radishes so that you could furnish for the table during the whole summer season.
6. Give the reasons why the soil should be frequently cultivated in a field of corn.
7. Name the grains grown by farmers in your vicinity.
8. Name three breeds of sheep.
9. Give three reasons why you would or would not keep Holstein cattle on the farm.
10. Describe a Percheron horse.

ARITHMETIC

60 Credits

1. Add 93,247.6; 6,324.928; 4,893.75; 786.434.
2. Find the interest on $1,200 for 1 year 6 months and 21 days at 5%.
3. A farmer sold 62 1/2% of his land, and had 120 acres left. How many acres did he own at first?
4. At $1.20 per square yard find cost of putting a six-foot cement walk along one side and one end of a school yard 20 rods by 12 rods.
5-6. A boy in a store receives $6 per week. He spends 25% of it for board and 20% of the remainder for clothes. He saves the balance. How many War Saving Stamps and Thrift Stamps could he buy during four weeks of May? The price of War Saving Stamps during May is $4.17.

MENTAL ARITHMETIC

40 Credits

Note: Examiners distribute problems face down. At a signal applicants turn papers over and using pencils for writing answers only, solve as many as possible in 30 minutes.

1. Paper napkins are selling at the rate of $1.00 per 1,000. At this rate, how much must be paid for 500?  
   Answer: 1.
2. Coal selling at $6.50 a ton in summer sells for $7.25 in the fall. How much is saved on a winter's supply of 10 tons by buying it in the summer?  
   Answer: 2.
3. Paper is selling at $.015 a sheet. At this rate how much must be paid for 10 sheets?  
   Answer: 3.
4. Write as decimal parts of a dollar, 3 mills.  
   Answer: 4.
5. A boy solved 12 out of 18 problems. What per cent of the 18 did he solve correctly?  
   Answer: 5.
6. How many board feet in a piece of timber 12 feet long 3 inches wide and 2 inches thick?  
   Answer: 6.
7. A girl, by helping her mother, earns 25c a week. If she puts into her bank half of this amount how long does it take her to save $1.00?  
   Answer: 7.
8. What is the length of a winter's day when the sun rises at 7:00 A. M. and sets at 4:39 P. M.?

9. How many inches in 1 ¼ feet?

10. Oranges are selling at 45c a dozen. At the same rate what must be paid for 8 oranges?

11. Robert cuts 3 ¾ yards of canvas from a piece 6 yards long. How many yards are left in the piece?

12. Write in figures one million, seven hundred eighty thousand.

13. Two-thirds of a yard of goods is bought for 40c. At this rate how much should be paid for a yard?

14. Write with dollar sign 2 dollars 8 cents 3 mills.

15. Three boys buy a rowboat for $15.75, sharing the expense equally. How much has each boy to pay?

16. Write as a decimal 4 25/1000.

17. 80 is 25% of what number?

18. Change to decimal fractions: ⅝, ¾.

19. 25% of what number is 12?

20. The outside dimensions of a box are 4 ft. × 3 ft. × 2 ft. If the boards are 1 in. thick, how many board feet are in box and its cover?

21. Give all the perfect squares between 1 and 25.

22. Find the square root of 25/36.

23. Find the cost of five bu. of wheat at $2.20 a bushel.

24. What is the interest on $150 for 2 years at 5%?

25. Write 80% as a decimal and as a fraction.

26. How many acres in a field 50 rds. by 16 rds.?

27. At 1 ¼ miles a minute, how far can an airship go in an hour?

28. If an ounce of meat is wasted daily in 16,000,000 homes in the United States, how many pounds are wasted in a week?

29. Write in figures: twenty-eight and twenty-five ten-thousandths.

30. If a person requires ¾ lb. of sugar a week, how many pounds are required by one person for a year?

31. 168

32. .05

33. .0025

34. 25

35. +12 ½

36. 36.

37. 1800

38. 40

39. +1 + 1 + 1 =

40. 40 - 10 + 5

Answer
CIVIL GOVERNMENT

1. Name the county officers; give three duties of the county clerk.
2. What are some of the duties of the county board of supervisors?
3. When is the governor of Michigan elected? How long is his term of office?
   Name three of his duties.
4. Name and locate three educational institutions of Michigan.
5. What is the duty of the board of health of the township?
6. What are some of the things that may be done to improve your schoolhouse
   and school grounds?
7. What was the purpose of the amendment to the United States Constitution
   that was ratified by several state legislatures during the past winter?
8. What cabinet officer has charge of all the post offices of the country?
9. What new class of voters has been added to the list of legal voters of Michigan?
10. How is a representative in Congress from Michigan nominated and elected?

GEOGRAPHY

1. Name the states bordering the Atlantic ocean. The Pacific.
2. What are trade winds? Define cape, strait, island, plateau.
3. Account for the heavy rainfall at the equator.
4. Name the three largest cities in the United States. Account for their remark-
   able growth.
5. Trace the route by which a carload of beef might travel from Chicago to Liver-
   pool.
6. Name the seas bordering Russia.
7. Locate the corn growing section of the United States; the hog raising section.
   Why is each located where it is?
8. Locate Pikes Peak, the Himalaya Mountains, Euphrates River, Canton, Ural
   Mountains.
9. What bodies of water do the following canals and straits connect: Suez Canal,
   Erie Canal, Kiel Canal, Strait of Bab el Mandeb, Dardanelles?

GRAMMAR

1. Illustrate each of the following by using in a sentence:
   A transitive verb
   A prepositional phrase
   A direct quotation
2. Underline the complete subject in each of the following sentences:
   At the door on summer evening
   Sat the little Hiawatha.
   The merry shouts of children fill the air.
3. Tell to what part of speech each word in italics belongs according to its use in
   the sentence:
   He ran fast.
   He was a fast runner.
   They fast twice a week.
   The fast lasted forty days.
4. Use each of the following words in sentences first as a noun, then as an adjective,
   then as a verb: light; spring.
5. Analyze:
   The city of Florence contains many palaces.
6. Fill these blanks with proper forms of lie or lay:
   Where did you.......................it?
   .......................down, Bruno!
   He was.......................by the brook.
   .......................it on the table, and let it.......................there.
7–8. James Brower who lives at 316 Capitol Avenue, Lansing, encloses a postal
   money order for $1.50 to Sprague Publishing Company, American Building,
   Detroit, as the subscription price for the American Boy for one year. Write
   his letter.
9–10. Write a paragraph telling how your school helped in the War.
ORTHOGRAPHY

To the Examiner: In marking papers, orthography should count fifty per cent and spelling fifty per cent.
1. Give the meaning of the following suffixes and write a word containing each suffix: less, er, full, ish, an, hood, able, ism, ed, let.
2. Use the following words in sentences: stile, style; oar, ore; aisle, isle; strait, straight; knead, need.
3. Divide into syllables and indicate the pronunciation of the following words: bouquet, moral, district, laundered, garage.
4. Write five common abbreviations with their meanings.
5. Write a synonym for each of the following words: beautiful, wealth, large.

SPELLING

To the Examiner: In marking papers, orthography should count fifty per cent and spelling fifty per cent.

1. diamond
2. women
3. through
4. fifth
5. disappoint
6. refer
7. marriage
8. stopped
9. weigh
10. there
11. minute
12. recommend
13. grammar
14. loose
15. which
16. height
17. Wednesday
18. separate
19. develop
20. meant
21. impossible
22. piece
23. neither
24. government
25. neighbor

Dictate the following for the pupils to write. The spelling of the words in italics in this exercise should count one-half in the spelling examination. Read without designating the words on which the spelling is to be graded.

We may imagine how Columbus felt, when, at daybreak, he was rowed to the shore, with waving banners and to the sound of music, and when he stepped upon the beach where no European had ever before landed. He bore the great flag of Spain, gorgeous with red and gold; and his captains bore each a green flag, inscribed with a cross. All knelt, and kissed the ground; then Columbus, rising, and drawing his sword, took possession of the island in the name of Spain, and called it “San Salvador.”

(Thomas Wentworth Higginson)

PENMANSHIP

1. Write the first stanza of The Star Spangled Banner.
2. Write all of the words of the song America.

Act 223 of the P. A. of 1915 requires that in all examinations for eighth grade diplomas, all applicants shall be required as a part of said examination to write from memory the first verse of The Star Spangled Banner and the words of America.

Mark penmanship on this paper.

PHYSIOLOGY

1. Of what use is the skeleton?
2. How does anger interfere with the work of digestion?
3. Give two bad effects of rapid eating.
4. How do arteries differ from veins with respect to location, walls, and kinds of blood they carry?
5. Describe the proper way to brush the teeth.
6. Why does a long night’s sleep help to make a person healthy?
7. What is the effect of alcohol on muscular power? On muscular control?
8. How many and what kinds of blood corpuscles? What is the work of each kind?
9. Describe the structure of a muscle.
10. During the influenza epidemic it was suggested that we “Cover Up Each Cough or Sneeze.” Why? Why should this suggestion be followed at all times?
READING
Based on *Columbus* by Joaquin Miller.

1. Write a brief sketch of the life of the author.
2. What is Columbus' leading characteristic? Give two incidents in his life which illustrate this characteristic.
4. Give the meaning of the following: *ghost of shores, mutinous, ghastly, wan.*
5. Give three reasons why the sailors became frightened.
6. Explain the line
   The words leapt as a leaping sword.
7. (a) What is the refrain in the poem?
   (b) Why does the poet repeat this idea so many times?
8. Explain the lines
   He gained a world; he gave that world
   Its greatest lesson: "On! sail on."
9. Elbert Hubbard calls *Columbus* the greatest poem ever written by an American.
   What reason can you give for this opinion?
10. Write from memory one stanza of the poem.

U. S. HISTORY

1. Name the nations that explored North America. Name one explorer of each.
2. Tell why any two of the following colonies were settled: Virginia, Maryland, Georgia, Massachusetts, Pennsylvania.
3. What were the Articles of Confederation?
4. Why was slavery more profitable in the South than in the North?
5. What event do you think of in connection with any five of the following dates:
    1607, 1793, 1789, 1620, 1765, 1898, 1609, 1863, 1498, April 6, 1917?
6. Name three U.S. inventions and give the name of the inventor.
7. Why was the purchase of Alaska so profitable to the United States?
8. Write an account of the life of Benjamin Franklin.
9. Compare the means of transportation in the United States in 1800 with that in 1900.
10. In the recent World War, who was commander of all the British forces in France and Belgium? Of the American forces? Of the French?