

paid \$55 on account. Make out his bill in proper form, showing balance due.

447. At 35 c. per sq. yd., what would it cost to plaster a wall 15 ft. high and 54 ft. long?

448. How much wood in three piles, the first of which contains 10 cd. 6 cd.ft. 4 cu.ft., the second, 12 cd. 12 cu.ft.; the third, 17 cd. 1 cd.ft?

449. Divide the sum of five thousand and two thousandths, by two hundredths.

450. \$10 is 12 per cent. of what number?

451. What is the amount of \$2,160 from March 10 to Dec. 1, at 5 per cent?

452. How much must be invested at 7 per cent. simple interest, to yield an annual income of \$630?

453. A note for \$1,800, payable in 60 days, was discounted at bank at 6 per cent.: how much did the holder receive?

454. What cost 9 hats, if 5 hats cost £4,5s?

455. If the wages of 6 men for 14 days are \$126, what, at the same rate, would be the wages of 9 men for 16 days?

456. Extract the square root of 6.5536.

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*Examination XX. Feb. 27, 1875.*

457. Write in words the number represented by the figures: 20463162486135.

458. Express in figures: fifty-seven billions fifty-nine millions ninety thousand and forty-seven.

459. Add  $\begin{array}{r} 1234 \\ 765 \\ 89 \\ 201 \\ 54 \\ 678 \\ 2109 \\ 345 \\ 987 \\ 102 \\ 3000 \\ 456 \\ 87 \\ 109 \\ 5432 \end{array}$  |
460. From 501505010678 take 794090589.
461. Multiply ninety thousand eight hundred and seven, by nine thousand one hundred and six.
462. 18 A. 0 R. 14 p. equal how many square feet?
463. 31557600 seconds equal how many days?
464. From 61 S. 15° 36' 15" take 53 S. 18° 50' 18".
465. If 84 loads of hay weigh 201 T. 6 cwt. 0 qr. 12 lb., what will 5 loads weigh?
466. What are the prime factors of 19965?
467. Find the least common multiple of 3, 4, 5, 6, 7, 8.
468. Reduce  $\frac{5}{7} \times \frac{3}{15} \times \frac{4}{16} \times 8\frac{3}{4} \times \frac{1}{5}$  to a simple fraction of the lowest terms.
469. Reduce  $\frac{4}{9}$ ,  $\frac{2}{3}$ ,  $\frac{1}{3}$ ,  $\frac{1}{4}$ ,  $\frac{1}{6}$  and  $\frac{1}{12}$  to equivalent fractions having the least common denominator.
470. What is the sum of  $\frac{3}{4}$ ,  $\frac{5}{6}$ ,  $\frac{2}{3}$ , and  $\frac{1}{12}$ ?
471. Divide  $116\frac{2}{7}$  by  $14\frac{1}{7}$ . (Give the answer as a mixed number, with its fraction of the lowest terms.)
472. Reduce  $\frac{4}{7}$  of a grain to the fraction of a pound Troy.
473. Paid \$4,355.52 for 49 $\frac{1}{2}$  pieces of carpeting: what would 37 $\frac{5}{7}$  pieces cost, at the same rate?
474. Multiply eighty-seven thousandths by fifteen millionths.
475. What decimal fraction is equivalent to  $\frac{7}{16}$ ?
476. What is 5 per cent. of \$789?
477. What is the interest of \$1,165.50, for 5 yr. 3 mo. 9 d. at 7 per cent?

478. What is the bank discount on \$780 for 30 days?
479. If A. travels 117 miles in 15 days, employing 9 hours a day, how far would he travel in 20 days, travelling 12 hours a day (at the same rate per hour)?
480. What is the square root of 23804641?

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*Examination XXI. June 5, 1873.*

481. Write 1873 in Roman characters.
482. What is *Notation*?
483. Write in words: 9008007006
484. To what number must 962 be added three times to make 8472?
485. \$9,843.621 plus \$4,687.32 plus \$84.321 plus \$.07 plus \$.64 plus \$973.241 = ?
486. Reduce 53684" to numbers of higher denominations.
487. Reduce .8975 of a week to whole numbers of lower denominations.
488. What cost  $10\frac{3}{8}$  tons of coal, at \$7 $\frac{5}{8}$  a ton?
489.  $108 \div \frac{12}{7} \times \frac{7}{11} - \frac{2}{3} = ?$
490. Find the least common multiple of 12, 16, and 28.
491. Reduce  $\frac{13}{8}$ ,  $\frac{12}{7}$ , and  $8\frac{5}{8}$  to the least common denominator.
492. A cubic foot of granite weighs 163 lb. 5 oz.; what is the weight of a block 3 ft.  $2\frac{3}{4}$  in. long, 2 ft. 4 in. wide, and 1 ft. 3 in. thick?