Qu. 1. Four days after a Courier, who travels 30 miles a day, had been dispatched, a second was sent with orders to overtake him; in order to which the latter goes 42 miles a day: In what time will he overtake the former?

Answ. 10 days.

Qu. 2. Four men A, B, C, and D, built a Ship which cost 2607 £, whereof B paid twice as much as A, C paid as much as A and B; and D paid as much as C and B; what did each pay?

Answ. A paid £ 237.
B. ------ 474.
C. ------ 711.
D. ------ 1185.
2607.

Qu. 3. A charitable Lady relieving four poor persons, gave among them 6s. 8d. to the second she gave twice, to the third thrice, & to the fourth four times as much as to the first: What did she give to each?

Answ. 1st. got 8d.
2d --- 1s 4d.
3d. --- 2. 0
4th. --- 2. 8
6s. 8d.

Qu. 4. A cask which held 126 gallons was filled with a mixture of Brandy, Wine, & Cyder; in it there were 13 gal. of Wine more than there were of Brandy, & as much Cyder as of both Wine & Brandy: What quantity was there of each?

Answ. 25 gal.s of Brandy.
38 ---- of Wine.
63 ---- of Cyder.
126

Qu. 5. In a lump of mixed metal weighing 29 ℔, there were 2 ℔ more of Silver than of Gold, 4 ℔ of copper more than of Silver & 3 ℔ of Brass more than of Copper: How many pounds were there of each?

Answ. Gold. 3. ℔.
Silver. 5.
Copper. 9.
Brass. 12.
29

Qu. 6. A detachment of four Regiments consisted of 5219: Colonel A. Regiment exceeded Col. B. by 22 men; Col. C. 73: & Col. 130. How many were there in each Regiment?

Answ. Colonel A. 1361
B. 1339
C. 1288
D. 1231
5219

Q.E.D.

Qu. 7. Six men were employed at the same kind of work, of whom the second earned 1s, the third 1s, the fourth 1s, the fifth 2s, the sixth 2s, respectively less than the first; & the five last earned in all three times as much as the first: What did each earn?

Answ. 1st earned 48d.

2d	35.
3d	3s.
4th	3s.
5th	2s
6th	1s
14s.	= 3s 48

Q.E.D.

Qu. 8. A man buys a suit of cloaths for each of his six children, he proposes to lay out four times as much on the eldest as on the youngest & to bestow 12s. a suit less on each than on the next elder: What will each suit cost?

Answ. Suit of 1st cost 4L.

2d	3.6s
3d	2.16
4th	2.4
5th	1.12
6th	1.0

Q.E.

Qu. 9. A & B, began trade with equal stocks; A in the first year trepled his stock all but 30L. B doubled his stock & had 50L to spare; now the amount of both their gains was four times the stock of each: What was the stock?

Answ. 20L.

Q.E.

Qu. 10. At an Election 375 persons voted; & the candidate chosen had a majority of 91: How many voted for each?

Answ. Person chosen had 233 Votes
The other — 142
375 Q.T.E

Qu. 11. Two men who had 35 guineas between them play'd together 'till one of them had wone 4 guineas of the other; & then the winner had twice as many guineas as the looser had at first: How many had each?

Answ. The Winner had 22 guineas
The Looser 13
35 Q.S.E.

Qu. 12. A gentleman being ask'd the age of his two Sons, replied, that if to the sum of their ages 425 be added, the number arrising will be double the age of the eldest; but if 8 be taken from the difference of their ages, the

remainder

remainder will be the Youngest's:
How old was each?

Answ. Age Eldest = 42
..... Youngest = 17.

Qu. 13. A merchant recev'd a bill of exchange in pistoles (at 16s. 6d.), guineas (at 21s.), & moidores (at 27s.); the sum of the pistoles & guineas was 40, the sum of the pistoles & moidores was 36, & the sum of the guineas & moidores was 30. What was the value of the bill?

Answ.

		L.	S.	D.
23 pistoles	=	18.	19.	6.
17 Guineas	=	19.	17.	0
13 Moidores	=	17.	11	
Bill	=	54.	7.	6

Qu. 14. The Stock of three Traders amounted 780L. the shares of the 1st & 2d exceeded the 3d by 220L. & the shares of the 2d & 3d was 380L.

more than the 1st: each share is requir'd

Answ. share 1st. 200
2d. 300
3d. 200.
700

Qu. 15. Two persons began play with equal sums of money; The first won 11 shillings, the other lost 7 shillings; and then the first had twice as many shillings as the second: What sum had each at first?

Answ. 25 Shillings

Qu. 16. A mercer having cut 12 yds off from each of three equal pieces of silk, found that the remnants taken together were 126 yds: what was the length of each piece?

Qu. 17.

(1790)

Qu. 17. After A.. had wone a shilling of B.. he had as many shillings as B.. had left; but had B.. wone a shilling of A.., then he would have had twice as many as A.. would have had left: How many had each?

Answ. A.. had 5 shillings
And B. .... 7 .....

Qu. 18. The paving of square at 2s. a yard, cost as much as the inclosing it at 5s. a yard: the side of the square is requir'd?

Answ. 10 yards

Qu. 19. A person, who ability was known to be greater than his industry, was hired to work for a year at 9d. a day; but with this condition, that for every day he play'd he should forfit 3d. now at the years end he neither mon

to

to receive nor to pay: How many days did he work?

Answ. He work'd 109½ days

Qu. 20. A General disposing his army into a square, finds he has 201 men more than a perfect square; but increasing the side by 1 he will want 25 men to compleat the square: How many had he?

Answ. 24000.

Qu. 21. It is requir'd to divide 14 into two such parts that the difference of the squares of those parts may be 56.

Answ. 9 & 5

Qu. 22. A. borrow'd of B. as much money as A had, & spent 6d. to treat him; after which meeting with C. A borrow'd twice as much money as he had left & treated him

him with 12d. Lastly I borrow'd of D. three times as much money as he had left, & spent on him 10d after which he had 30d left. What had he at first?

Answ. 7d.

Qu. 23. Upon measuring the Corn produc'd by a field being, 62 ft, it appears that it had yeilded but ⅓ part more than what was sown. What was sown?

Answ. 6 bushels

Qu. 24. A Gentleman left 210 L. between his two children; to his Daughter he left half as much as he did to his Son. What did he leave to each?

Answ. Son had 140
Daughter 70
210

Qu. 25. Being sent to Market to buy a certain quantity of meat, I found that if I bought Beef at 4d a ℔ I should lay out all the money I was intrusted with; but if I bought Mutton at 3½d a ℔ I should have 2s left: How much meat was sent for?

Answ. 40 ℔

Qu. 26. A fish was caught whose tail weighed 9 ℔; his head weighed as much as his tail & half his body; & his body weighed as much as his head and tail: What did the fish weigh?

Answ. Fish weighed 72 ℔.

Qu. 27. One being asked how old he was answered, that the product of 1/20 of the years he had lived being multiplied by 5/8 of the same would be his age: What was it?

Answ. 32.

Qu. 28. Some persons agreed to give 6d. each to a Waterman for carrying them from London to Gravesend, but with this condition, that for every other person taken in by the way 3d. should be abated in their joint fare; now the Waterman took in 3 more than a 4 part of the number of the first passengers, in consideration of which he took of them but 5d. each: How many passengers were there at first?

Answ. 36

Qu. 29. From each of 16 peices of gold an artist filed the worth of half offered them in payment for their original vallue; but being detected & the peices weigh'd, they were found worth no more than 8 Guineas; Pere original worth is requir'd?

Answ. 13.

Qu. 30. What sum of money is that from which 5 £ being subtracted $\frac{2}{3}$ of the remainder will be 40 £?

Answ. 65 £

Qu. 31. One being ask'd the hour of the day, replied, that the time then pass'd from noon, was equal to $\frac{29}{43}$ of the time remaining till midnight. What was the hour?

Answ. 4h 50'.

Qu. 32. It is requir'd to divide 55 into two such parts that the greater divided by their difference may quote 6?

Answ. { 30 = greatest number.
25 = least.

Qu. 33. A. having about him 240 £. & B. having 96 £ were met by Thieves who took from A. twice as much as

as from B; & left A. three times as much as they left B. What sum was each robbed of?

Answ. A. Lost 96.

B. ..... 48.

Qu. 34. A Son asking his Father how old he was, he replied, my age 7 year ago was just 4 times as great as your age at that time; but 7 years hence if You & I live my age will only be double to Yours: the age of each person is requir'd?

Answ. Father's age 35.

Son's ..... 14.

Qu. 35. A company of 18 persons men & women, clubbing for a reckoning of 9 £ 18s. paid each as many shillings as there were men in company. How many were there?

Answ. 11 Men & 7 Women.

Qu. 36. At an Election the number of voters was three times the majority by which the choice was carried: & the product of the numbers that voted for each was 122 times the said majority: how many voters had each?

Answ. 122.
61.

Qu. 37. A man bought 8 yds of cloth for 62s; for part of it he paid 9s a yard & for the rest 7: How much was bought of both?

Answ. He bought 3 yds at 9s
& 5 yds at 7s.

Qu. 38. A person paying a bill of 50 £. with half guineas & crowns using 101 pieces in all: How many of each sort did he pay? Answ. 90 ½ gs
11 Crs.

Qu. 39. Two remnants of cloth which together measur'd 40 yds, were of equal value; & the one sold at 3s the other 7s a yard. How many yards were there of each?

Answ. 28 yds at 3s
12 yds at 7s.

Qu. 40. Having laid out 37s in Brandy at 2s & Rum at 3s a quart, I find that I could have bought as many quarts of Rum as I now have of Brandy & as many of Brandy as now of Rum for 4s less: How much was bought?

Answ. 5 qts of Brandy
& 9 qts of Rum.

Qu. 41. A person exchanges 6 french crowns & dollars for 45s & at another time 9 french crowns & 5 dollars for 76s.

What were the value of the crown & dollar?

Answ. 6s. 1d. 7/9 French crown.
4s. 3d. 2/9 Dollar.

Qu. 42. A Gentleman gave to 3 persons 5 £, the second receiv'd 4/9 of the sum given to the first & the third 1/4 of what the second had: how much had each?

Answ. 1st received £3 6s.
2d 1 6
3d 4
5 6

Qu. 43. Out of a Cask of liquor 63 gls were sold to 2 persons between them; to the first 1/3 to the second 2/5 of what the cask contain'd: What did the cask

cask hold?
Answ. 12.6.

Qu. 44. Out of a cask of wine which had leak'd away $\frac{1}{3}$, 21 gls were drawn; & then being gauged, it appear'd to be $\frac{1}{2}$ full. How much did it hold?
Answ. 126 gls

Qu. 45. After paying away $\frac{1}{4}$ & $\frac{1}{5}$ of my money, I found 66 guineas left in my purse. What was in it at first?
Answ. 120 Guineas.

Qu. 46. A Gentleman gave in charity 46 £; a part thereof, in equal portions, to 5 poor men; & the rest, in equal portions, to 7 poor women; now a man & a woman had between them 8 £.

What was given to the men & what to the women?

Answ. Men had 5£. a piece
& the Women 3£.

Qu. 47. What fraction is that to the numerator of which if 1 be added the value will be $\frac{1}{3}$; but if 1 be added to the denominator, its value will be $\frac{1}{4}$?

Answ. $\frac{4}{15}$.

Qu. 48. Two remnants of cloth were bought, which measured one 7, the other 5 yds; the first & 1 yd. of the second cost 3£. 0s. also the second & 1 yd. of the first cost the same sum; what were each valued at a yard?

Answ. 1st remnant at 0s. per yard.
2d. ———————— 21.

Qu. 49. A man dying left his Wife with child, ordering by his will, that if the child proved a daughter, then the wife should have $\frac{2}{3}$ & child $\frac{1}{3}$ of his estate, but if it was a Son then he should have $\frac{2}{3}$ & the Mother $\frac{1}{3}$ thereof; now it happen'd that the Mother was deliver'd of a Son & a daughter. How must the Estate which 6300 £. be divided between them?

Answ. Daughter had 900 £.

Mother	1800
Son	3600
	6300

Qu. 50. There is a cask containing 120 gls, fill'd with Brandy, Wine, Cyder, & Water; the Brandy & Wine together make $\frac{1}{2}$; the Brandy & Cyder make $\frac{2}{3}$ & the Brandy

(1803)

& Water $\frac{3}{4}$ of the last: The quantities of each are requir'd?

Answ. Brandy 55 gallons
Wine ... 5
Cyder 25
Water 35
120

Qu. 51. The expense of building a Ship was 3900£ and was defrayed by two Merchants, whose shares were as 4 to 9: What did each pay?

Answ. 1st Merchant paid 1200£
The other ... 2700
3900

Qu. 52. A Draper sold $\frac{1}{4}$ of a piece of cloth at 5s a yard, $\frac{1}{5}$ of it at 4s a yard, and $\frac{1}{8}$ of it at 4s 6d a yd, by which he got 8 guineas. How many yards did the piece contain?

Answ. 60 Yards

Qu. 53. The Governors of Christ's-Hospital bestow'd $\frac{1}{2}$ of a legacy committed to their trust, among 3 of their boys who were sent to the University; $\frac{1}{4}$ of it among 7 boys sent to Sea; & $\frac{1}{5}$ of among 11 boys bound to trade; now 1 Scholar, 1 Sea-boy, & 1 Apprentice receiv'd among them 10 £ 1 s. What was the Legacy.

Answ. 160 £. 4 s.

Qu. 54. Nine boys robb'd an orchard; the first had for his share $\frac{1}{5}$, 2d. $\frac{1}{12}$, 3d. $\frac{1}{8}$, 4th. $\frac{1}{20}$, 5th. $\frac{1}{7}$, 6th. $\frac{1}{4}$; 7th. had 310, 8th 420, the 9th 140 apples; How many apples had they in all?

Answ. 5880.

Qu. 55. A person at play won twice as much as he began with & then lost 18s; after which he lost $\frac{4}{5}$ of what remain'd; lastly he won as much as he began with; then counting his mony found he had 8 0s. What sum did he begin with?

Answ. 22s.

Qu. 56. A man and his wife did usually drink out a vessel of beer in 12 days; but when the man was out the vessel lasts the woman 30 days: In how many days would the man allone be a drinking it out?

Answ. 20.

Qu. 57. A Cistern into which water may be let by two cocks will be fill'd by both in 12 hours, & by the 1st cock allone in 20 hours: In what time would it be filled by the 2d cock allone?

Answ. 30.

Qu. 58. A sum of money is to be shared between 2 persons A. & B. so that as often as A takes 9 L. B is to take 4 L; Now it happen'd that A receiv'd 15 L. more than B. There respective shares are required?

Answ. A had 27 L.
B. ——— 12.

Qu. 59. A Footman who contracted for 8 L. a year & a livery was turn'd away at the end of 7 months & receiv'd only 2 L. 3s. 4d. & his livery: What was the vallue of the livery?

Answ. Vallue of the Livery 6 L.

Qu. 60. A market Woman bought a certain number of eggs at 2 a penny, & as many at 3 a penny, & sold them all out again at the rate of 5 for two pence, after

after which she found that instead of making her money again she lost 4d. pence: What number of eggs had she?

Answ. 240.

Qu. 61. What number is that, to which if 3, 5, 8, be severally added; the 1st sum shall be to the 2d as the 2d is to the 3d?

Answ. 1.

Qu. 62. A Hare being 50 of her leaps before a Greyhound, takes 4 leaps to the Greyhound's 3; but 2 of the Greyhound's leaps are as much as 3 of the Hare's: How many leaps must the Greyhound take to catch the Hare?

Answ. 300 Leaps.

Qu. 63. The joint stock of two partners whose particular shares differ by 40 £. was to the

the lesser as 14 to 5: Their particular shares are desir'd?

Answ. 90.

Qu. 61. A Bankrupt owed to 2 Creditors 140 £; the difference of which debts was to the greater of them as 4 to 9: What were the debts?

Answ. The Greater is 90
The Lesser is 50
140.