

Instructions

To be able to solve logic problems you must first understand what it is you are looking for. In the sample puzzle below, note that there are four columns going across with each containing exactly the same information in two groups that are separated by a line. Only ONE answer is correct in each group for each column, and that ONE answer will NOT be correct in any other place. There are numbered clues that you are to use to solve the puzzle. To keep track of your logical deductions, you are to cross off possibilities on the puzzle until the correct answer is revealed, and then circle that correct answer. Sometimes, the correct answer is revealed before you have crossed off all the possibilities. When this happens, you must still cross off the other possibilities in that group and also cross off that possibility in the other columns, because other answers may be revealed when you do this. Never guess because all of the information to solve the puzzle is given, and you never need to guess if you are thinking clearly. Also, an incorrect guess does not just make one answer wrong but causes logical inconsistencies all through the rest of the puzzle.

The best way to learn how to solve logic problems is to work one. Read the sample puzzle below and use the CROSS OFF and CIRCLE technique. On the following page we show the completed puzzle and all the thinking you needed to do to solve the puzzle.

RAT RACE

The top four finishers in the annual beauty queen and rat derby were the lovely Bambi, Debi, Cindi and Mari who trained rats named Brighteye, Dorable, Sweetlips and QT Pie. In a startling coincidence, the place the lovely ladies finished in the beauty queen contest exactly matched the place their pets placed in the rat derby. This was a first in the history of the sport! Based on the clues, match the finishing place for both the girls and the rats.

THE CLUES

1. Mari finished after Debi, but at least she did not finish last.
2. Cindi finished ahead of Debi.
3. Brighteye and Sweetlips did not finish either first or last.
4. Cindi did not name her pet rat QT Pie, and Brighteye finished in front of Mari's pet rat.

1st Place	2nd Place	3rd Place	4th Place
Bambi	Bambi	Bambi	Bambi
Debi	Debi	Debi	Debi
Cindi	Cindi	Cindi	Cindi
Mari	Mari	Mari	Mari
Brighteye	Brighteye	Brighteye	Brighteye
Dorable	Dorable	Dorable	Dorable
Sweetlips	Sweetlips	Sweetlips	Sweetlips
QT Pie	QT Pie	QT Pie	QT Pie

1st Place	2nd Place	3rd Place	4th Place
Bambi	Bambi	Bambi	Bambi
Debi	Debi	Debi	Debi
Cindi	Cindi	Cindi	Cindi
Mari	Mari	Mari	Mari
Brighteye	Brighteye	Brighteye	Brighteye
Dorable	Dorable	Dorable	Dorable
Sweetlips	Sweetlips	Sweetlips	Sweetlips
QT Pie	QT Pie	QT Pie	QT Pie

EXPLANATION OF SOLUTION

CLUE #1 allows you to cross off Mari under 1st place because the clue tells you that Mari finished after Debi and obviously, 1st place is not after anything. The clue adds the information that Mari did not finish last so you cross Mari's name off in the 4th place column as well. The clue also gives us information about Debi. We know that Mari finished after Debi, so Debi can not be in 4th place because there is no place after 4th place for Mari to be in. And we can also cross off Debi under 3rd place because Mari has to finish after Debi and we know Mari did not finish in 4th place. Thus, Debi can not be the answer for 3rd place because Mari did not finish in 4th place.

CLUE #2 The information in clue #2 gives us all we need to know to solve the beauty queen part of the puzzle. The only possibilities left for Debi are 1st or 2nd place. Cindi finishing ahead of Debi puts Cindi in 1st place and Debi in 2nd place. When you circle those names in the correct column, and cross off the other names in that column, and cross off Cindi and Debi under the other columns, you will find Mari as the only possibility for 3rd place and Bambi as the only possible answer for 4th place.

CLUE #3 allows you to cross off both Brighteye and Sweetlips under 1st place and 4th place. Doing this shows you that the only possibility for those two must be 2nd and 3rd places. We do not know which is which at this point, but we know that Dorable and QT Pie are eliminated for those places so we cross them off under 2nd and 3rd place columns. Thus, when we finish the crossing off based on this clue, we have only Dorable and QT Pie left as possibilities for 1st place and 4th place, and Brighteye and Sweetlips as possibilities for 2nd place and 3rd place.

CLUE #4 The first part of clue #4 allows you to cross off QT Pie in the 1st place column because we know that Cindi finished in 1st place leaving only Dorable as the answer for that column, and QT Pie as the only remaining answer for 4th place. The second part of the clue tells us that Brighteye finished in front of Mari's pet rat. We know that Mari's pet rat finished in 3rd place so it has to be Brighteye in the 2nd place column, leaving Sweetlips as the only possibility for 3rd place. The puzzle is solved!

1

In Search of Chickens

THE STORY

Five animals named Marvin, Mary, Mike, Margie and Mavis were sitting around the forest one day discussing the best methods for getting into the local farmer's chicken coop. The animals were a bear, a fox, a raccoon, a lynx and a skunk. They each used a different tool for the job. The tools were a twig, a fishhook, a toothbrush, a feather and a thorn. The animals were impressed with the ingenuity of the other animals and called them "sneaky," "stealthy," "cunning," "sly" and "slippery." Based on the clues, match the names with their animal types, their tools and the names they used.

THE CLUES

1. The bear used a feather and called the other animals "stealthy."
2. Marvin was not called "cunning."
3. Mary did not call the other animals either "stealthy" or "sly," and she did not get into the chicken coop with a fishhook.
4. The skunk used a fishhook and called the other animals "slippery."
5. Mike and Margie were not bears, and one of them used a fishhook.
6. The raccoon called the other animals "sly."
7. Mary was not a lynx, and Margie was not called "sly."
8. Mary and Margie did not use a twig to get into the chicken coop, and the fox favored the toothbrush!

Marvin	Mary	Mike	Margie	Mavis
bear	bear	bear	bear	bear
fox	fox	fox	fox	fox
raccoon	raccoon	raccoon	raccoon	raccoon
lynx	lynx	lynx	lynx	lynx
skunk	skunk	skunk	skunk	skunk
twig	twig	twig	twig	twig
fishhook	fishhook	fishhook	fishhook	fishhook
toothbrush	toothbrush	toothbrush	toothbrush	toothbrush
feather	feather	feather	feather	feather
thorn	thorn	thorn	thorn	thorn
"sneaky"	"sneaky"	"sneaky"	"sneaky"	"sneaky"
"stealthy"	"stealthy"	"stealthy"	"stealthy"	"stealthy"
"cunning"	"cunning"	"cunning"	"cunning"	"cunning"
"sly"	"sly"	"sly"	"sly"	"sly"
"slippery"	"slippery"	"slippery"	"slippery"	"slippery"

2

Off the Hook!

THE STORY

Five fish were sitting around a lake waiting for school to start. Their names were Bubbles, Bugeye, Barney, Buster and Bucky. They all belonged to a different species of fish. They were a perch, a blue gill, a bass, a trout and a herring. And it turned out that they all had been hooked once but had escaped! They all had been fooled by five different baits used by five different anglers. They had been lured by a cheese ball, a plastic worm, a night crawler, a leech and a green lure. The anglers that hooked them were Mr. Hooker, Mrs. Spinner, Mrs. Caster, Mr. Sinker and Mr. Rodman. All of the fish suffered from a different physical or psychological trauma caused by their narrow escapes. They suffered from a torn lip, a broken tooth, a fin sprain, panic attacks and nightmares. Based on the clues, match the fish with their species, their baits, the anglers that hooked them and their injuries.

THE CLUES

1. The blue gill was nearly caught by Mr. Rodman using a leech for bait.
2. The perch suffered from nightmares after biting on Mrs. Caster's cheese ball.
3. The herring suffered from a severe fin sprain after biting on Mrs. Spinner's plastic worm.
4. Bubbles told the trout that the trout's broken tooth was not noticeable when he smiled.
5. Bugeye and Barney did not have a close call with either Mr. Sinker or Mr. Rodman, and Bugeye and Barney did not suffer from a broken tooth.
6. Bucky was not a trout, and Bugeye was not a herring.
7. Bubbles was not either a perch or a herring, and he did not bite on a leech.
8. The blue gill did not suffer from panic attacks, and the trout did not bite Mr. Sinker's green lure.

Bubbles	Bugeye	Barney	Buster	Bucky
perch blue gill bass trout herring				
cheese ball plastic worm night crawler leech green lure				
Mr. Hooker Mrs. Spinner Mrs. Caster Mr. Sinker Mr. Rodman				
torn lip broken tooth fin sprain panic attacks nightmares				

3

Menu Madness!

THE STORY

The Blakely School menu as shown below was entirely wrong. All of the items shown were served, but nothing was shown correctly. Based on the menu and the clues, see if you can figure out exactly when everything was served.

THE CLUES

- Nothing as shown on the menu above was correct.
- Monday's main dish was really served the day before Friday, Tuesday's main dish was really served a day earlier than shown, Wednesday's main dish was served later than shown and, of course, the liver & onions were really served after the frittata.
- Thursday's vegetable was served later than shown, Wednesday's vegetable was served later than shown, and Tuesday's vegetable was served earlier than shown, but keep in mind the fact that the lima beans were still really served earlier in the week than the green beans.
- The grape juice was really served later than shown, but the orange juice was really served after the grape juice. However, the fruit punch was really served earlier than shown on the faulty menu, but it was still really served later in the week than the milk.
- The apple pie and ice cream were served later than shown on the menu, and the pudding was really served later in the week than the apple pie. Of course, the cupcake was served later in the week than the fruit cup. Thank goodness we now know the right menu for the week!

Monday	Tuesday	Wednesday	Thursday	Friday
tuna casserole lima beans milk pudding	ham eggplant orange juice ice cream	fried chicken peas grape juice apple pie	liver & onions mashed potatoes fruit punch cupcake	frittata green beans tomato juice fruit cup

Monday	Tuesday	Wednesday	Thursday	Friday
tuna casserole ham fried chicken liver & onions frittata				

Monday	Tuesday	Wednesday	Thursday	Friday
lima beans eggplant peas mashed potatoes green beans				

Monday	Tuesday	Wednesday	Thursday	Friday
milk orange juice grape juice fruit punch tomato juice				

Monday	Tuesday	Wednesday	Thursday	Friday
pudding ice cream apple pie cupcake fruit cup				

4

Chirper by the Dozen

THE STORY

Five sparrows named Binky, Becky, Bobby, Billy and Bert flew to a bird feeder at different times, so one was 1st to land, another 2nd to land, and so on. While at the feeder, they all ate a different number of seeds; they ate 10, 21, 30, 40 and 60 seeds. Also, while at the feeder, they all chirped a different number of times; they chirped 5, 7, 10, 15 and 20 times. When they were finished eating and chirping they all flew back to their nests, which were in five different locations. Their nests were in an oak tree, an elm tree, a pine tree, a chimney and a gutter. Based on the clues, match the sparrows with their order of landing, the number of seeds they ate, the number of chirps they made and the locations of their nests.

THE CLUES

1. Binky landed after Billy, Becky landed after Binky, and Bobby landed before Bert but after Becky.
2. Bert ate more seeds than Binky and Bobby, but Billy ate twice as much as Bert and, of course, Bobby ate less than Binky.
3. Becky chirped half as much as Bobby, Bert chirped less than Billy, and Billy chirped more than both Binky and Bobby.
4. Binky, by the way, chirped less than Bert.
5. Billy and Bert did not live in any kind of tree.
6. The 1st to land lived in a gutter, and Becky and Bobby did not live in an oak tree.
7. The bird that chirped the least lived in an elm tree.

Binky	Becky	Bobby	Billy	Bert
1st to land				
2nd to land				
3rd to land				
4th to land				
5th to land				
10 seeds				
21 seeds				
30 seeds				
40 seeds				
60 seeds				
5 chirps				
7 chirps				
10 chirps				
15 chirps				
20 chirps				
oak tree				
elm tree				
pine tree				
chimney	chimney	chimney	chimney	chimney
gutter	gutter	gutter	gutter	gutter

Solutions to Puzzles

1. In Search of Chickens

Marvin	Mary	Mike	Margie	Mavis
lynx	fox	skunk	raccoon	bear
twig	toothbrush	fishhook	thorn	feather
“cunning”	“sneaky”	“slippery”	“sly”	“stealthy”
Bob	Barry	Bernard	Billy	Burt
Bonnie	Belle	Bambi	Bertha	Betsy
Billy	Burt	Bob	Bernard	Barry

2. Off the Hook!

Bubbles	Bugeye	Barney	Buster	Bucky
bass	perch	herring	trout	blue gill
green lure	cheese ball	plastic worm	night crawler	leech
Mr. Sinker	Mrs. Caster	Mrs. Spinner	Mr. Hooker	Mr. Rodman
panic attacks	nightmares	fin sprain	broken tooth	torn lip

3. Menu Madness!

Monday	Tuesday	Wednesday	Thursday	Friday
ham	frittata	liver & onions	tuna casserole	fried chicken
eggplant	lima beans	green beans	peas	mashed potatoes
tomato juice	milk	fruit punch	grape juice	orange juice
fruit cup	cupcake	ice cream	apple pie	pudding

4. Chirper by the Dozen

Binky	Becky	Bobby	Billy	Bert
2nd to land	3rd to land	4th to land	1st to land	5th to land
21 seeds	40 seeds	10 seeds	60 seeds	30 seeds
7 chirps	5 chirps	10 chirps	20 chirps	15 chirps
oak tree	elm tree	pine tree	gutter	chimney