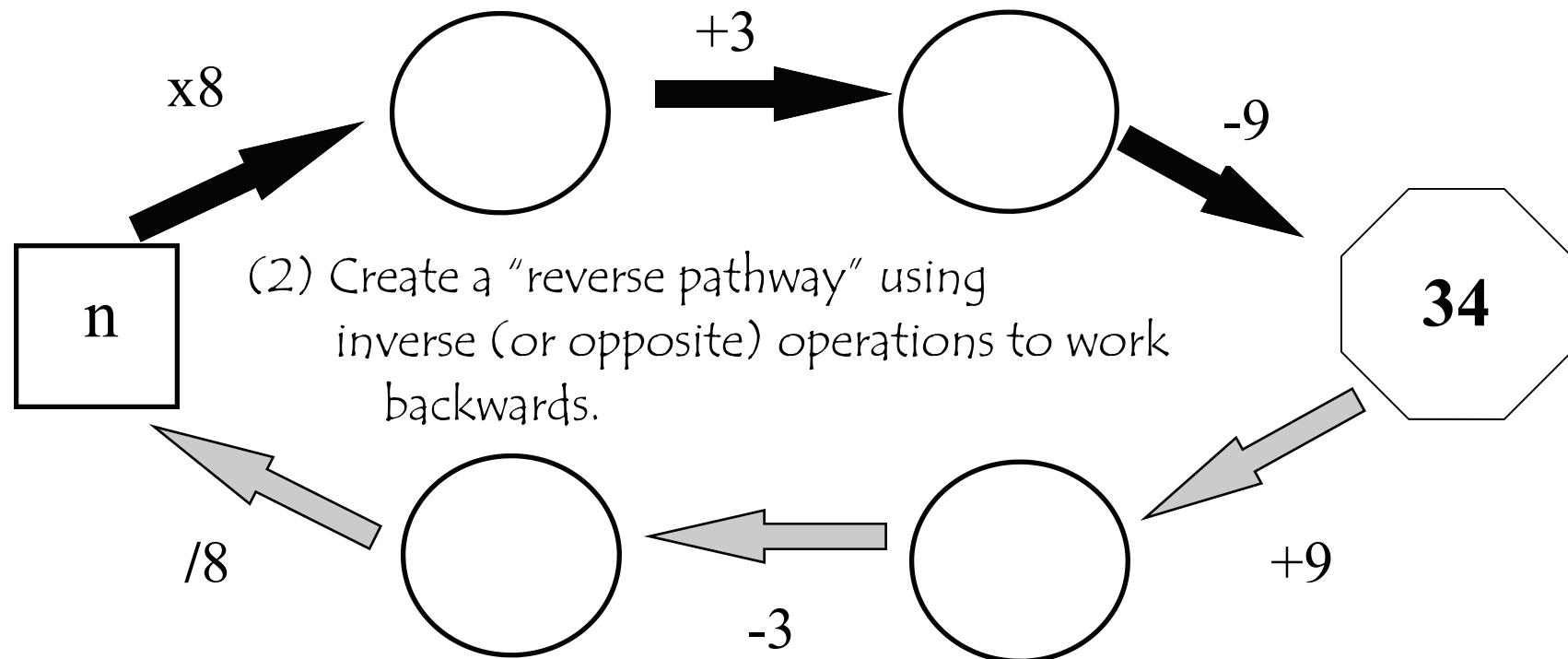


# Making Paths— Example

Grade 4

If you multiply a number by 8, then add 3, then subtract 9, you get 34.  
What's the number?

SOLUTION: (1) Create a pathway using the given operations.



- (3) Work backwards from the answer, writing each number in a circle.
- (4) Find the missing number ( $n$ ). Check to see that it works on the pathway.

# Making Paths—1

Grade 4

A. If you multiply a number by 2, then add 3, then subtract 1, you get 12.  
What's the number?

B. If you multiply a number by 3, then add 8, then subtract 10, you get 28.  
What's the number?

C. If you multiply a number by 6, then add 3, then subtract 8, you get 49.  
What's the number?

D. If you multiply a number by 4, then add 2, then subtract 7, you get 43.  
What's the number?

## Making Paths—2

Grade 4

A. If you multiply a number by 7, then subtract 6, then add 9, you get 59.

What's the number?

B. If you multiply a number by 4, then subtract 2, then add 5, you get 47.  
What's the number?

C. If you multiply a number by 6, then subtract 10, then add 3 , you get 29.  
What's the number?

D. If you multiply a number by 9, then subtract 3, then add 8, you get 41.  
What's the number?

## Making Paths—3

Grade 4

A. If you divide a number by 6, then subtract 5, then add 3, you get 5.  
What's the number?

B. If you divide a number by 9, then multiply by 8, then add 4, you get 60.  
What's the number?

C. If you divide a number by 7, then multiply by 4, then subtract 6 , you get 22. What's the number?

D. If you divide a number by 4, then multiply by 9, then add 3, you get 75.  
What's the number?

## Making Paths—4

Grade 4

A. If you add 2 to a number, then multiply by 4, then subtract 3, then divide by 5, you get 9.

What's the number?

B. If you add 1 to a number, then multiply by 8, then subtract 6, then divide by 10, you get 5.

What's the number?

C. If you subtract 6 from a number, then multiply by 7, then subtract 3, then divide by 5, you get 12.

What's the number?

D. If you divide a number by 8, then multiply by 9, then add 8, then divide by 5, you get 7.

What's the number?

# Making Paths—5

Grade 4

A.

B.

C.

D.

# Making Paths—Answers

Grade 4

## Making Paths—1

- A. 5
- B. 10
- C. 9
- D. 12

## Making Paths—2

- A. 8
- B. 11
- C. 6
- D. 4

## Making Paths—3

- A. 42
- B. 63
- C. 49
- D. 32

## Making Paths—4

- A. 10
- B. 6
- C. 15
- D. 24