

## هیورستیک‌ها:

## کوچکترین فاصله منتهی تا هر یک از قارچ‌های باقیمانده

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prev state: None state: 4 6 selected action: R
H from state: 4 6 changed to: 3
prev state: 4 6 state: 5 6 selected action: R
H from state: 5 6 changed to: 2
prev state: 5 6 state: 5 6 selected action: L
H from state: 5 6 changed to: 2
prev state: 5 6 state: 4 6 selected action: R
H from state: 4 6 changed to: 3
prev state: 4 6 state: 5 6 selected action: D
H from state: 5 6 changed to: 2
prev state: 5 6 state: 5 5 selected action: R
H from state: 5 5 changed to: 1
prev state: 5 5 state: 6 5 selected action: U
H from state: 6 5 changed to: 2
prev state: 6 5 state: 6 5 selected action: L
H from state: 6 5 changed to: 2
prev state: 6 5 state: 5 5 selected action: U
H from state: 5 5 changed to: 1
prev state: 5 5 state: 5 6 selected action: D
H from state: 5 6 changed to: 2
prev state: 5 6 state: 5 5 selected action: L
H from state: 5 5 changed to: 1
prev state: 5 5 state: 4 5 selected action: R
H from state: 4 5 changed to: 2
prev state: 4 5 state: 5 5 selected action: D
BLUE mushroom found!!!
H from state: 5 5 changed to: 3
prev state: 5 5 state: 5 4 selected action: R
H from state: 5 4 changed to: 2
prev state: 5 4 state: 6 4 selected action: U
H from state: 6 4 changed to: 3
prev state: 6 4 state: 6 5 selected action: U
H from state: 6 5 changed to: 3
prev state: 6 5 state: 6 5 selected action: U
H from state: 6 5 changed to: 4
prev state: 6 5 state: 6 5 selected action: L
H from state: 6 5 changed to: 4
prev state: 6 5 state: 5 5 selected action: U
H from state: 5 5 changed to: 3
prev state: 5 5 state: 5 6 selected action: R
H from state: 5 6 changed to: 3
prev state: 5 6 state: 5 6 selected action: R
H from state: 5 6 changed to: 4
prev state: 5 6 state: 5 6 selected action: L
H from state: 5 6 changed to: 4
prev state: 5 6 state: 4 6 selected action: L
H from state: 4 6 changed to: 3

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H from state: 3 6 changed to: 2
prev state: 3 6 state: 4 6 selected action: L
H from state: 4 6 changed to: 3
prev state: 4 6 state: 3 6 selected action: L
H from state: 3 6 changed to: 2
prev state: 3 6 state: 2 6 selected action: R
H from state: 2 6 changed to: 1
prev state: 2 6 state: 3 6 selected action: L
H from state: 3 6 changed to: 2
prev state: 3 6 state: 2 6 selected action: L
RED mushroom found!!!
prev state: 2 6 state: 1 6 selected action: finish

```

**Number of actions: 29**

تعداد قارچهای باقیمانده

prev state: None state: 4 6 selected action: R  
H from state: 4 6 changed to: 6  
prev state: 4 6 state: 5 6 selected action: R  
H from state: 5 6 changed to: 6  
prev state: 5 6 state: 5 6 selected action: L  
H from state: 5 6 changed to: 6  
prev state: 5 6 state: 4 6 selected action: L  
H from state: 4 6 changed to: 6  
prev state: 4 6 state: 3 6 selected action: R  
H from state: 3 6 changed to: 6  
prev state: 3 6 state: 4 6 selected action: D  
H from state: 4 6 changed to: 7  
prev state: 4 6 state: 4 5 selected action: R  
H from state: 4 5 changed to: 6  
prev state: 4 5 state: 5 5 selected action: R  
H from state: 5 5 changed to: 6  
prev state: 5 5 state: 6 5 selected action: U  
H from state: 6 5 changed to: 6  
prev state: 6 5 state: 6 5 selected action: L  
H from state: 6 5 changed to: 6  
prev state: 6 5 state: 5 5 selected action: U  
H from state: 5 5 changed to: 6  
prev state: 5 5 state: 5 6 selected action: D  
H from state: 5 6 changed to: 7  
prev state: 5 6 state: 5 5 selected action: L  
H from state: 5 5 changed to: 6  
prev state: 5 5 state: 4 5 selected action: U  
H from state: 4 5 changed to: 6  
prev state: 4 5 state: 4 6 selected action: L  
H from state: 4 6 changed to: 7  
prev state: 4 6 state: 3 6 selected action: L  
H from state: 3 6 changed to: 6  
prev state: 3 6 state: 2 6 selected action: R  
H from state: 2 6 changed to: 6  
prev state: 2 6 state: 3 6 selected action: D  
H from state: 3 6 changed to: 7  
prev state: 3 6 state: 3 6 selected action: L  
H from state: 3 6 changed to: 7  
prev state: 3 6 state: 2 6 selected action: L  
RED mushroom found!!!  
H from state: 2 6 changed to: 5  
prev state: 2 6 state: 1 6 selected action: R  
H from state: 1 6 changed to: 5  
prev state: 1 6 state: 2 6 selected action: D  
H from state: 2 6 changed to: 6  
prev state: 2 6 state: 2 5 selected action: R  
H from state: 2 5 changed to: 5  
prev state: 2 5 state: 2 5 selected action: U  
H from state: 2 5 changed to: 5  
prev state: 2 5 state: 2 6 selected action: L  
H from state: 2 6 changed to: 6  
prev state: 2 6 state: 1 6 selected action: D  
H from state: 1 6 changed to: 6  
prev state: 1 6 state: 1 6 selected action: R

H from state: 1 6 changed to: 7  
prev state: 1 6 state: 2 6 selected action: D  
H from state: 2 6 changed to: 6  
prev state: 2 6 state: 2 5 selected action: L  
H from state: 2 5 changed to: 5  
prev state: 2 5 state: 2 5 selected action: D  
H from state: 2 5 changed to: 6  
prev state: 2 5 state: 2 4 selected action: R  
RED mushroom found!!!  
H from state: 2 4 changed to: 4  
prev state: 2 4 state: 3 4 selected action: R  
H from state: 3 4 changed to: 4  
prev state: 3 4 state: 3 4 selected action: U  
H from state: 3 4 changed to: 4  
prev state: 3 4 state: 3 4 selected action: L  
H from state: 3 4 changed to: 4  
prev state: 3 4 state: 2 4 selected action: U  
H from state: 2 4 changed to: 4  
prev state: 2 4 state: 2 5 selected action: D  
H from state: 2 5 changed to: 5  
prev state: 2 5 state: 2 4 selected action: L  
H from state: 2 4 changed to: 4  
prev state: 2 4 state: 1 4 selected action: R  
H from state: 1 4 changed to: 4  
prev state: 1 4 state: 2 4 selected action: D  
H from state: 2 4 changed to: 5  
prev state: 2 4 state: 2 4 selected action: R  
H from state: 2 4 changed to: 5  
prev state: 2 4 state: 3 4 selected action: D  
H from state: 3 4 changed to: 5  
prev state: 3 4 state: 3 4 selected action: R  
H from state: 3 4 changed to: 6  
prev state: 3 4 state: 3 4 selected action: L  
H from state: 3 4 changed to: 6  
prev state: 3 4 state: 2 4 selected action: L  
H from state: 2 4 changed to: 5  
prev state: 2 4 state: 1 4 selected action: U  
H from state: 1 4 changed to: 4  
prev state: 1 4 state: 1 4 selected action: D  
H from state: 1 4 changed to: 5  
prev state: 1 4 state: 1 3 selected action: R  
H from state: 1 3 changed to: 4  
prev state: 1 3 state: 1 3 selected action: U  
H from state: 1 3 changed to: 4  
prev state: 1 3 state: 1 4 selected action: D  
H from state: 1 4 changed to: 5  
prev state: 1 4 state: 1 3 selected action: D  
H from state: 1 3 changed to: 5  
prev state: 1 3 state: 1 2 selected action: R  
H from state: 1 2 changed to: 4  
prev state: 1 2 state: 1 2 selected action: U  
H from state: 1 2 changed to: 4  
prev state: 1 2 state: 1 3 selected action: D  
H from state: 1 3 changed to: 5

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prev state: 1 3 state: 1 2 selected action: D
H from state: 1 2 changed to: 5
prev state: 1 2 state: 1 1 selected action: R
H from state: 1 1 changed to: 4
prev state: 1 1 state: 2 1 selected action: R
BLUE mushroom found!!!
prev state: 2 1 state: 3 1 selected action: finish
Number of actions: 56
```

بیشترین فاصله منتهی بین هر دو قارچ باقیمانده

prev state: None state: 4 6 selected action: R  
H from state: 4 6 changed to: 10  
prev state: 4 6 state: 5 6 selected action: R  
H from state: 5 6 changed to: 10  
prev state: 5 6 state: 5 6 selected action: L  
H from state: 5 6 changed to: 10  
prev state: 5 6 state: 4 6 selected action: L  
H from state: 4 6 changed to: 10  
prev state: 4 6 state: 3 6 selected action: R  
H from state: 3 6 changed to: 10  
prev state: 3 6 state: 4 6 selected action: D  
H from state: 4 6 changed to: 11  
prev state: 4 6 state: 4 5 selected action: R  
H from state: 4 5 changed to: 10  
prev state: 4 5 state: 5 5 selected action: R  
H from state: 5 5 changed to: 10  
prev state: 5 5 state: 6 5 selected action: U  
H from state: 6 5 changed to: 10  
prev state: 6 5 state: 6 5 selected action: L  
H from state: 6 5 changed to: 10  
prev state: 6 5 state: 5 5 selected action: U  
H from state: 5 5 changed to: 10  
prev state: 5 5 state: 5 6 selected action: D  
H from state: 5 6 changed to: 11  
prev state: 5 6 state: 5 5 selected action: L  
H from state: 5 5 changed to: 10  
prev state: 5 5 state: 4 5 selected action: U  
H from state: 4 5 changed to: 10  
prev state: 4 5 state: 4 6 selected action: L  
H from state: 4 6 changed to: 11  
prev state: 4 6 state: 3 6 selected action: L  
H from state: 3 6 changed to: 10  
prev state: 3 6 state: 2 6 selected action: R  
H from state: 2 6 changed to: 10  
prev state: 2 6 state: 3 6 selected action: D  
H from state: 3 6 changed to: 11  
prev state: 3 6 state: 3 6 selected action: L  
H from state: 3 6 changed to: 11  
prev state: 3 6 state: 2 6 selected action: L  
RED mushroom found!!!  
H from state: 2 6 changed to: 6  
prev state: 2 6 state: 1 6 selected action: R  
H from state: 1 6 changed to: 6  
prev state: 1 6 state: 2 6 selected action: D  
H from state: 2 6 changed to: 7  
prev state: 2 6 state: 2 5 selected action: R  
H from state: 2 5 changed to: 6  
prev state: 2 5 state: 2 5 selected action: U  
H from state: 2 5 changed to: 6  
prev state: 2 5 state: 2 6 selected action: L  
H from state: 2 6 changed to: 7  
prev state: 2 6 state: 1 6 selected action: D  
H from state: 1 6 changed to: 7  
prev state: 1 6 state: 1 6 selected action: R

H from state: 1 6 changed to: 8  
prev state: 1 6 state: 2 6 selected action: D  
H from state: 2 6 changed to: 7  
prev state: 2 6 state: 2 5 selected action: L  
H from state: 2 5 changed to: 6  
prev state: 2 5 state: 2 5 selected action: D  
H from state: 2 5 changed to: 7  
prev state: 2 5 state: 2 4 selected action: R  
RED mushroom found!!!  
H from state: 2 4 changed to: 5  
prev state: 2 4 state: 3 4 selected action: R  
H from state: 3 4 changed to: 5  
prev state: 3 4 state: 3 4 selected action: U  
H from state: 3 4 changed to: 5  
prev state: 3 4 state: 3 4 selected action: L  
H from state: 3 4 changed to: 5  
prev state: 3 4 state: 2 4 selected action: U  
H from state: 2 4 changed to: 5  
prev state: 2 4 state: 2 5 selected action: D  
H from state: 2 5 changed to: 6  
prev state: 2 5 state: 2 4 selected action: L  
H from state: 2 4 changed to: 5  
prev state: 2 4 state: 1 4 selected action: R  
H from state: 1 4 changed to: 5  
prev state: 1 4 state: 2 4 selected action: D  
H from state: 2 4 changed to: 6  
prev state: 2 4 state: 2 4 selected action: R  
H from state: 2 4 changed to: 6  
prev state: 2 4 state: 3 4 selected action: D  
H from state: 3 4 changed to: 6  
prev state: 3 4 state: 3 4 selected action: R  
H from state: 3 4 changed to: 7  
prev state: 3 4 state: 3 4 selected action: L  
H from state: 3 4 changed to: 7  
prev state: 3 4 state: 2 4 selected action: L  
H from state: 2 4 changed to: 6  
prev state: 2 4 state: 1 4 selected action: U  
H from state: 1 4 changed to: 5  
prev state: 1 4 state: 1 4 selected action: D  
H from state: 1 4 changed to: 6  
prev state: 1 4 state: 1 3 selected action: R  
H from state: 1 3 changed to: 5  
prev state: 1 3 state: 1 3 selected action: U  
H from state: 1 3 changed to: 5  
prev state: 1 3 state: 1 4 selected action: D  
H from state: 1 4 changed to: 6  
prev state: 1 4 state: 1 3 selected action: D  
H from state: 1 3 changed to: 6  
prev state: 1 3 state: 1 2 selected action: R  
H from state: 1 2 changed to: 5  
prev state: 1 2 state: 1 2 selected action: U  
H from state: 1 2 changed to: 5  
prev state: 1 2 state: 1 3 selected action: D  
H from state: 1 3 changed to: 6

prev state: 1 3 state: 1 2 selected action: D  
H from state: 1 2 changed to: 6  
prev state: 1 2 state: 1 1 selected action: R  
H from state: 1 1 changed to: 5  
prev state: 1 1 state: 2 1 selected action: R  
BLUE mushroom found!!!  
prev state: 2 1 state: 3 1 selected action: finish

**Number of actions: 56**