

## Preliminary Planning Sheet

### Grade 2 – Ladybugs and Spiders

**Domain(s)**

Operations and Algebraic Thinking

**Standard(s)**

2.OA.A.1

**Mathematical Practices**

MP.1 MP.4 MP.6 MP.7

**Major Underlying Mathematical Concepts**

- Number sense to 60
- Addition/Counting on

**Problem Solving Strategies**

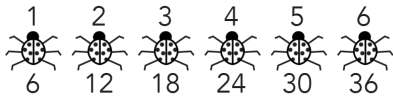
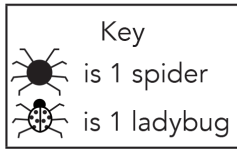
- Model (manipulatives)
- Diagram/Key
- Chart

**Formal Mathematical Language and Symbolic Notation**

- Model
- Diagram/Key
- Chart
- Dozen
- More than (>)/Greater than (>)/Less than (<)
- Equivalent/Equal to
- Pair
- Per
- Pattern
- Double
- Total/Sum

### Possible Solution(s)

There is a total of 60 spider and ladybug legs. A spider has 8 legs, so 3 spiders have 24 legs. A ladybug has 6 legs, so 6 ladybugs have 36 legs.



Insect	Total Legs
Spider	8
Spider	16
Spider	24
Ladybug	30
Ladybug	36
Ladybug	42
Ladybug	48
Ladybug	54
Ladybug	60

### Possible Connections

Below are some examples of mathematical connections. Your students may discover some that are not on this list.

- There are 2 dozen spider legs.
- There are 3 dozen ladybug legs.
- There are 5 dozen legs in all.
- Patterns: Spider legs +8, Ladybug legs +6.
- Spiders have 4 pairs of legs.
- Ladybugs have 3 pairs of legs.
- Ladybugs have 2 more legs than spiders.
- Relate to a similar task and state a math link.
- Solve more than one way to verify the answer.