#### $1^{\mbox{\scriptsize st}}$ Grade Math Screener Directions and Materials

### Materials:

- Print the provided materials below. Laminate if desired.
- Collect counters (blocks, bears, red/yellow counter etc.) You will need two different colors and a minimum of 30.
- Small white board with marker or paper and pencil.

### **Directions:**

- 1. You will flash the dot pattern cards for ½ second. Make sure you have the student's attention focused on the card before you flash it. Avoid flashing the numbers in numerical order: 6, 7, 8, 10, as the student may guess correctly.
- 2. Have the student count forward by 10s.
- 3. Have the student count forwards by 1s starting at 68.
- 4. Have the student count backwards by 1s starting at 100.
- 5. Put out a pile of 30 counters. Ask the student to give you 25. Note if they count them by ones, fives, or tens. This will help you know how they are seeing and thinking about numbers.
- 6. Put 29 counters in front of the student in a pattern: rows of 10s or 5s, as if they were in a tens frame (do not use the tens frames). See if the student can count without touching each counter.
- 7. Put a tens frame in front of the student and put 18 counters in the frame. Ask the student how many counters are in the frame.
- 8. Put 20 counters in front of the student and then put the 2 tens frames in front of the student (do not put the counters in the frame). Ask the student if there are enough counters to fill the frames.
- 9. Have the number path available with a sticky note or small paper over the numeral 6. Ask the student what number goes there. If they are correct then ask how they know to determine how they are seeing and thinking about numbers.
- 10. Ask the student to show you 7 fingers. If correct then ask to show 9 fingers. Can they do it without counting each finger? Do they know one hand is 5 and then count on?
- 11. Put out 10 counters. Ask student to count 5 of them. If they can, you put one more in their pile and ask how many they have now. Can they tell you without recounting?
- 12. Using the same 10 counters, ask the student to count 4 of them. If they can, you put two more counters in their pile and ask how many they have now; can they tell you without recounting?
- 13. Show the student the numeral 6. Ask what number it is, and then ask what number is one less, and then two less.
- 14. Explain to the student that you are going to say a number and you want them to tell you the number that will make 10. What goes with 9 to make 10? What goes with 5 to make 10? What goes with 8 to make 10? What goes with 3 to make 10? You can ask the student how they know, especially if they are incorrect to understand how they are thinking about numbers.
- 15. Ask the student what goes with 12 to make 20? Then ask them how they solved the problem.
- 16. Count out 17 counters and give them to the student. Ask how many do you need to take away to make 10? Watch to see if they can tell you with out counting.



- 17. Put 17 counters of one color in front of the student and then cover them. Say, "Here are 17 counters. Show 5 counters of another color. Say, "Here are 5 counters. Ask, "How many counters are there altogether?"
- 18. Put 12 counters of one color in front of the student and then cover them. Say, "Here are 12 counters." Remove 4 counters from under the cover, and show the student. Say, "There were 12 counters and I removed 4. How many are left? Make sure the counters remain hidden from view.
- 19. Show the student the addition flashcards in order: 9+3, 9+4, 9+5, 9+6. Show the first card and have the student write the answer on a small white board or on paper. Then show the next card and say, can you use your answer to that one to solve this one? Continue until all the problems have been attempted.
- 20. Show the student the subtraction flashcards in order: 7-5, 27-5, 47-5. Show the first card and have the student write the answer on a white boar or on paper. Then show the next card and say, can you use your answer to solve this one? Continue until all problems have been attempted.



## 1<sup>st</sup> Grade Math Screener

Name:	Date:

Subitizing Score	/2	%
Verbal Counting Score	/6	%
Object Counting Score	/3	%
Cardinality Score	/3	%
Spatial Relationships Score	/3	%
One/Two More and Less	/5	%
Benchmarks to 10 Score	/6	%
Part-Part-Whole Score	/8	%
Total	/36	%

# Subitizing Score \_\_\_\_\_ out of 2 = \_\_\_\_%

Standard(s		Notes/Student Response
)		
1.NBT.1	<ol> <li>Explain to student, "I am going to show you a card for a very short time and then you will need to tell me how many dots you saw on the card." Flash card for ½ second. Ask, "How many dots did you see?"</li> </ol>	
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	<ul> <li>Correct &amp; Fluent, Automatic Response (2)</li> </ul>	
	<ul> <li>Not Fluent, Some Problem Solving Takes Place (1)</li> </ul>	
	<ul> <li>Unsuccessful (0)</li> </ul>	



	Verbal Counting out of 6 =%	
Standard(s)		Notes/Student Response
1.NBT.5	<ul> <li>2. "Start counting forwards by 10s." Stop student at 100.</li> <li>"Now count forwards by 10s from 4." Stop student at 114.</li> <li>o Correct &amp; Fluent on All, On and Off the Decade (2)</li> <li>o Correct On the Decade but NOT Off the Decade (1)</li> <li>o Any Incorrect (0)</li> </ul>	
1.NBT.1	<ul> <li>3. "Start counting forwards from 68." Stop student at 120.</li> <li>Correct &amp; Fluent on All, On and Off the Decade (2)</li> <li>Correct On the Decade but NOT Off the Decade (1)</li> <li>Any Incorrect (0)</li> </ul>	
1.NBT.1	<ul> <li>4. "Count back from 100." Stop student at 87.</li> <li>o Correct &amp; Fluent (2)</li> <li>o Any Delayed yet All Correct (1)</li> <li>o Any Incorrect (0)</li> </ul>	

# Object Counting Score\_\_\_\_ out of 3 = \_\_\_\_\_%

Standard(s)		Notes/Student Response
1.NBT.1	5. Put out a pile of 30 counters. Say, "Get me 25 counters."	
	<ul> <li>Correct (1)</li> </ul>	
	<ul> <li>Incorrect (0)</li> </ul>	
1.NBT.1	6. Put 29 counters in front of the student. Say, "How many are there?"	
	<ul> <li>Correct, without touching (2)</li> </ul>	
	<ul> <li>Correct, with 1 to 1 touching (1)</li> </ul>	
	<ul> <li>Incorrect (0)</li> </ul>	



Standard(s)		Notes/Student Response
1.NBT.1	7. Show student ten frames with 18 counters. Ask, "How many counters?"	
1.NB1.2	<ul> <li>Correct without counting (1)</li> <li>Incorrect (0)</li> </ul>	
1.NBT.2	8. Put 20 counters out with 2 ten frames. Ask, "Do we have enough counters	
	to fill the ten frames?"	
	<ul> <li>Correct without moving the counters (2)</li> </ul>	
	<ul> <li>Correct, but has to put them into the ten frame (1)</li> </ul>	
	<ul> <li>Incorrect (0)</li> </ul>	

### Cardinality Score \_\_\_\_out of 3 = \_\_\_\_%

Spatial Relationships Score \_\_\_\_out of 3 = \_\_\_\_\_%

Standard(s)		Notes/Student Response
1.NBT.1	9. Show student the number path with the number 6 covered. Ask, "What	
	number goes here?" Point to the blank. If they answer correctly, ask, "How	
	do you know?"	
	<ul> <li>Correct, Uses Non-Count-By-One Strategy to Solve (2)</li> <li>Correct, but Uses a Count-By-Ones Strategy including Counting-On (1)</li> </ul>	
	<ul> <li>Incorrect (0)</li> </ul>	
1.NBT.1	10. Say, "Show me 7 fingers." (If correct), Say, "Show me 9 fingers."	
	<ul> <li>Correct without counting (1)</li> </ul>	
	<ul> <li>Incorrect (0)</li> </ul>	

### One/Two More and Less Score \_\_\_out of 5 = \_\_\_\_%

Standard(s)		Notes/Student Response
1.NBT.1 1.OA.5	11. Put 10 counters in front of student. Say, "Count out 5 counters." If successful, put one more counter in their pile and ask, "how many do you have now?"	
	<ul> <li>Correct without recounting (2)</li> </ul>	
	<ul> <li>Correct with recounting (1)</li> </ul>	



	<ul> <li>Incorrect (0)</li> </ul>	
1.NBT.1	12. Put 10 counters in front of student. Say, "Count out 4 counters." If	
1.OA.5	successful, put two more counters in their pile and ask, "how many	
1.OA.6	counters do you have now?"	
	<ul> <li>Correct without recounting (2)</li> <li>Correct with accounting (2)</li> </ul>	
	<ul> <li>Correct with recounting (1)</li> <li>Incorrect (0)</li> </ul>	
1.NBT.1	13. Show student the numeral 6. Ask, "What number is this?" "What number is	
1.OA.5	one less than this?" "What number is two less than this?"	
1.OA.6	<ul> <li>Correct (1)</li> <li>Incorrect (0)</li> </ul>	



	Benchmarks to 10 Score out of 6 =%	
Standard(s)		Notes/Student Response
1.OA.3	14. "I will say a number and you say the number that goes with it to make 10."	
1.OA.5	For each number say, "What goes with to make 10?"	
1.OA.6	9(1) 5(5) 8(2) 3(7)	
1.NBT.1	<ul> <li>Correct &amp; Fluent, Automatic Response (2)</li> </ul>	
	<ul> <li>Not Fluent, Some Problem Solving Takes Place (1)</li> </ul>	
	<ul> <li>Unsuccessful (0)</li> </ul>	
1.OA.3	15. "What goes with 12 to make 20?" Then if needed ask, "How did you solve	
1.OA.5	it?"	
1.OA.6	<ul> <li>Correct, Uses Non-Count-By-One Strategy to Solve (2)</li> </ul>	
1.NBT.1	<ul> <li>Correct, but Uses a Count-By-Ones Strategy including Counting-On (1)</li> </ul>	
	<ul> <li>Incorrect (0)</li> </ul>	
1.OA.3	16. Count out 17 counters. Ask, "How many counters would you need to take	
1.OA.5	away to make 10?"	
1.OA.6	<ul> <li>Correct, automatically (2)</li> </ul>	
1.NBT.1	<ul> <li>Correct, but counts (1)</li> </ul>	
	<ul> <li>Incorrect (0)</li> </ul>	





	Part-Part-Whole Score Out of 8 =%	
Standard(s		Notes/Student Response
)		
1.OA.3	17. Briefly display 17 red counters, then cover. Say, "Here are 17 red counters."	
1.OA.5	Briefly display 5 yellow counters then cover. Say, "Here are five yellow	
1.OA.6	counters. How many counters all together?" Then ask, "How did you solve	
1.NBT.1	it?"	
	<ul> <li>Correct, Uses Non-Count-by-One Strategies (2) 22</li> </ul>	
	• Correct, Counts-on to Add (1)	
	<ul> <li>Incorrect (0)</li> </ul>	
1.OA.3	18. Briefly display 12 red counters then cover. Remove 4 and show, then cover.	
1.OA.5	Say, "There were 12 counters and I removed 4. How many are left?" Both	
1.OA.6	collections remain covered. Then ask, "How did you solve it?"	
1.NBT.1	<ul> <li>Correct, Uses Non-Count-By-One Strategies (2) 8</li> </ul>	
	<ul> <li>Correct, Counts-back or up to Subtract (1)</li> </ul>	
	<ul> <li>Incorrect (0)</li> </ul>	
1.OA.3	19. Show the card beginning with 9+3 and ask, "Do you know the answer to	
1.OA.5	this?" Write the answer. Continue to show cards saying, "Can you use that	
1.OA.6	one to help you solve this one?"	
1.NBT.1	9+3 9+4 9+5 9+7	
	• Correct & Referenced Related Addition (2)	
	• Correct but Worked Each Out <b>OR</b> used Relational Addition to answer the last	
	three based on an initial error (might sound like "11, 12, 13, 15" without	
	counting) (1)	
	<ul> <li>Unsuccessful (0)</li> </ul>	

Dart Dart Whole Score out of 8 -0/



1.OA.3	20. Show the card beginning with 7-5 and ask, "Do you know the answer to
1.OA.5	this?" Write the answer. Continue to show cards saying, "Can you use that
1.OA.6	one to help you solve this one?"
1.NBT.1	7 - 5 27 - 5 47 - 5
	<ul> <li>Correct &amp; Referenced Related Subtraction (2)</li> <li>Correct but Worked Each Out <b>OR</b> used relational subtraction to answer the last two based on an initial error (might sound like 3, 23, 43 without counting or solving) (1)</li> <li>Unsuccessful (0)</li> </ul>







**+5=** 



9+7=









