Supplemental Material S1. Narrative scoring rubric.

1. Introduction/Setting

The Introduction/Setting category assesses how well the child sets the scene for the narrative. Ideal story introductions describe when and where the story takes place and who the story is about. Providing a timeframe, physical location, and brief list of characters at the beginning of a story provides the listener with the basic information needed to understand the rest of the story.

Scoring

When assessing the introduction/setting of the narrative, scorers determine whether "when," "where," and "who" are addressed. If all three are provided, **3** points are given in this category. If only two parts are provided, **2** points are given. If only one part is provided, **1** point is given. If no introduction is given, meaning that the narrative begins with an action, **0** points are given.

1. Introduction/Setting	
0 points – Unsatisfactory	- No introduction is given - Narrative begins with an action
1 point – Needs Improvement	Child answers only one of the following questions: When? Who? Where?
2 points – Satisfactory	Child answers only two of the following questions: When? Who? Where?
3 points – Excellent	Child answers all three of the following questions: When? Who? Where?

Notes
- "When" must include, at a minimum, "clock or calendar." "Clock" refers to time of day (morning, afternoon, night, etc.), and "calendar" refers to time of year, such as a season or a month.
  - Examples of "when": *One night; One day in May; One sunny afternoon; Late one night; A long time ago, on a summer afternoon*
  - *Once upon a time; One day; Once; Once there was; etc.* are too general, unspecific, and do not count as a "when".
  - *Please note that *One night* counts but *One day* does not. This is because *night* implies a specific time of day, thus fulfilling the "clock" requirement, but *one day* refers to an entire day.

2. Plot

Narrative production requires the speaker/writer to produce utterances that relate to a central topic and follow one another in a logical order. Consequently, plot assessment affects the assessment of other narrative features. A narrative cannot be given 3 points, which denotes excellence, in the Referencing, Focus, Order, or Cohesion category if it has not received 3 points in the Plot category.

Scoring

For a language sample to be considered a narrative it must have an explicitly stated goal or description of the motivation behind the events that take place, a problem that makes it harder for the goal to be reached, and a related resolution. If all three of these elements are provided, **3** points are given. If only two of the elements are provided, **2** points are given, and if only one is provided, **1** point is given. If none of these features are provided, the narrative receives **0** points for Plot. A simple description of events or actions does not constitute a narrative.

2. Plot	
0 points – Unsatisfactory	No goal, problem, or resolution
1 point – Needs Improvement	Child provides only one of the following: Goal, Problem, Resolution
2 points – Satisfactory	Child provides only two of the following: Goal, Problem, Resolution
3 points – Excellent	Child provides all three of the following: Goal, Problem, Resolution

Notes
• *And they lived happily ever after* is not considered a resolution. It is too broad and not goal-related.

3. Character Descriptions/Development

The Character Descriptions/Development category assesses how well the child describes characters in the story. This category is not a measure of the quantity of characters the child puts in their story; rather, it is an evaluation of the description and development of characters in the story.

Scoring

If detailed descriptions of more than one character and entity are provided, the narrative receives **3** points in this category. If detailed descriptions of one character/entity, or limited descriptions of several characters/entities, are provided, **2** points are given. Labels that specify a relationship, such as "brother," "friend," "mother," etc., can be considered a limited description. **1** point is given to narratives that contain a limited description of one character/entity, or the same description is attributed to more than one character/entity. If no characters/entities are described, or if descriptions are of the most basic level (e.g. "a man," "the kids"), **0** points are given.

3. Character Descriptions/Development	
0 points – Unsatisfactory	Child fails to describe any characters/entities, or, if he/she does, character labels are of the most basic level (e.g., *the boy, the girl, the bat*)
1 point – Needs Improvement	- Limited description of one character/entity (e.g., *sister, friend, the gray bat*; names) - Or the same description is attributed to more than one character/entity
2 points – Satisfactory	- In-depth description of one character/entity - Or limited descriptions of several characters/entities
3 points – Excellent	- In-depth descriptions of more than one character/entity

Notes

- "Entity" refers to groups of characters (e.g., *the family*; *some owls*; *group of friends*).

- A character can be <u>any</u> animal or person in the narrative.

- When a child gives names for the characters in their story, the names are considered a limited character description as well as a fulfillment of the "who" question in the Introduction/Setting category.

4. Characters' Mental States (Thoughts and Feelings)

The Mental States category assesses how the child describes the thoughts and feelings of the characters in the narrative. The child may explicitly state how a character is feeling (e.g., "that made her angry"), or use mental and linguistic verbs to express characters' thoughts and feelings.

Scoring

3 points are given if several mental states are provided for several characters/entities, if one character/entity infers the thoughts and feelings of another character/entity, and if sophisticated lexical items (i.e., words) are used to describe mental states. Narratives do not have to meet all three criteria to be given 3 points. Scores should be chosen by looking across all instances of mental states and deciding which point value most closely represents the language sample. If several different mental states are described for one character/entity, or one mental state is provided for several character/entities, **2** points are given. **1** point is given if the narrative has one mental state for one character/entity or the same mental state is attributed to more than one character/entity. Lastly, if no mental states are provided, **0** points are given.

4. Mental States (characters' thoughts and feelings)	
0 points – Unsatisfactory	No mental states
1 point – Needs Improvement	- One mental state given for one character/entity - Or the same mental state is attributed to more than one character/entity
2 points – Satisfactory	- Several different mental states given for one character/entity - Or one mental state for several characters/entities (cannot use same mental state for all characters)
3 points – Excellent	- Several mental states given for several characters/entities - One character inferring the mental state of another character - Sophisticated lexical items are used to describe mental states

Notes

- "Entity" refers to a group of characters (e.g., *the family*; *some owls*; *group of friends*).
  - e.g., *All the pigs had been watching from the ground. They had no idea what was going on.*
- Mental states that are part of a character/entity *description* do not count (e.g., *Julie was a clever girl*).
- Mental states receive credit as long as they are used in the correct context and the meaning is obvious to the reader; spelling and grammatical errors are OK (e.g., *When the thunderstorm came the boy worry of the birds*).
- *And they lived happily ever after* – not a mental state
- *noticed* – not a mental state, but a physical action akin to "saw" or "looked"
- Commonly used mental states: *admired, concerned, decided, did not know, did not want, enjoyed, feared, felt, figured out, glad, got over it, happy, hated, had no idea, hungry, knew, liked, loved, mad, nervous, panicked, realized, sad, scared, shrugged it off, taken by surprise, thought, wanted, wished, without thinking, worried*

5. Referencing

This category assesses the child's ability to make clear reference in the narrative so that the audience is able to follow who and what is being talked about. Correct referencing involves using words such as personal pronouns (e.g., he, she, it, they), possessive pronouns (e.g., my, his, hers, your), and demonstratives (e.g., that, those, these) in place of previously introduced people, places, or things.

Scoring

3 points are given if all characters/entities, objects, and places are referenced correctly throughout a longer, more complex story. Stories that do not meet the criteria for a complete narrative (a Plot score of 3) cannot be given 3 points for Referencing. Maintaining correct reference in a short language sample that cannot be considered a true narrative is less challenging than maintaining reference in a longer, more complex, and complete narrative. If correct referencing is used throughout a story that is short and simple, or a few referencing errors occur in a story that is longer and more complex, **2** points are given. If referencing attempts are made but significant errors occur, **1** point is given, and if no correct referencing exists in the story, **0** points are given.

5. Referencing Does the listener/reader know who and what the child is referring to at all times? Correct referencing involves using words such as personal pronouns (e.g., he, she, it, they), possessive pronouns (e.g., my, his, hers, your), and demonstratives (e.g., that, those, these) in place of previously introduced people, places, or things.	
0 points – Unsatisfactory	- No correct referencing for any characters/entities, objects, or places
1 point – Needs Improvement	- Referencing attempts are made but significant error(s) occur - Child mentions characters/entities, objects, places that were never introduced or established
2 points – Satisfactory	- Correct referencing is maintained, but the story is short and simple; it does not meet criteria of being a narrative - Or the story is longer and more complex, but there are a few referencing errors
3 points – Excellent	- All characters/entities, objects, and places are referenced correctly throughout a story that is longer and more complex - **Must have a Plot score of 3 to get a 3 in this category**

Notes

- Keep in mind, referring to an element using "the" without previously introducing the element typically indicates a referencing error. In the following example the child says *the two birds*, implying that he discussed them earlier, but he did not. This is a referencing error.
  - e.g., *Once me and my family were on a picnic. My mom said there was a storm coming so my mom and sister went inside. It started to rain and there was thunder and a tornado. So I quickly grabbed a bird's nest and also the two birds so they wouldn't be harmed. That was my rainy day.*

6. Focus

A well-focused story has a beginning, middle, and end that tie together effortlessly. Well-focused stories do not contain irrelevant information or stray from the plot. The Focus category assesses how well the narrative stays on topic.

Scoring

Longer, more complex narratives that maintain focus on the plot are given **3** points. If long and complex narratives stray from the plot in a couple spots, **2** points are given. **2** points are also given to short, simple stories that maintain focus on the plot. If the majority of the story lacks clear focus and very few utterances relate to the plot, **1** point is given. Stories that deserve **1** point often sound like a series of picture descriptions. Lastly, **0** points are given to stories that have no clear focus and sound like a series of random events.

6. Focus A well-focused story has a beginning, middle, and end that tie together effortlessly to develop the plot. Well-focused stories do not stray from the plot.	
0 points – Unsatisfactory	- No clear focus - Sounds more like a series of random events instead of a story
1 point – Needs Improvement	- The majority of the story lacks focus - Very few C-units relate to the plot - Series of picture descriptions - Child is rambling
2 points – Satisfactory	- Focus is maintained, but the story is short and simple - Or the story is longer and more complex, but the focus slips in a couple places
3 points – Excellent	- Longer, more complex story that maintains focus - **Must have a Plot score of 3 to get a 3 in this category**

7. Order

The "Order" category assesses how well setting descriptions and events follow a logical progression.

Scoring

Longer, more complex narratives that follow a logical progression and have demonstrated mastery of the Plot category are given **3** points. Short, simple stories that follow a logical progression, and longer stories that for the most part follow a logical progression, are given **2** points. **1** point is given if only a few C-units are in order, and **0** points are given if no C-units are in order.

7. Order Do setting descriptions and events follow a logical progression?	
0 points – Unsatisfactory	- No logical progression
1 point – Needs Improvement	- A few C-units are in logical order, but overall, setting descriptions and events occur in a random order
2 points – Satisfactory	- All C-units follow a logical progression, but the story is short and simple - Or the story is longer, more complex, and generally follows a logical progression, but a few C-units seem out of order
3 points – Excellent	- Longer, more complex story that follows a logical progression - **Must have a Plot score of 3 to get a 3 in this category**

8. Details

The "Details*"* category assesses the child's use of elaborated phrases to describe events and provide extra information.

Scoring

3 points are given to longer and more complex narratives that are filled with great detail. Shorter stories with great detail, and longer, more complex stories that could benefit from a few additional details, are given **2** points. **1** point is given to narratives that contain only a few details with nothing extra. If no supporting details are provided, **0** points are given.

8. Details This category assesses the child's use of elaborated phrases to describe events and provide extra information.	
0 points – Unsatisfactory	- Very short story with no supporting details
1 point – Needs Improvement	- Only a few details - The bare minimum: contains enough details for the reader to know that the child is attempting to tell a story, but no extra information is given
2 points – Satisfactory	- Interesting, descriptive details are given, but the story is relatively short - Or the story is longer and more complex with adequate details, though additional elaborated descriptions and extra information would make the story more interesting and clearer for the reader
3 points – Excellent	- Story is longer, more complex, and filled with explicit and interesting details, making the story both enjoyable and captivating

9. Narrative Tense

The "Narrative Tense" category assesses the child's ability to maintain correct verb tense throughout the narrative.

Scoring

If correct tense is maintained and at least one change in tense is appropriately implemented, **3** points are given. **2** points are given to short, simple stories that have no tense or form errors, and longer, more complex stories that maintain correct tense but may have a couple form errors. Stories that maintain correct tense at times but have some errors are given **1** point. **0** points are given to narratives that have so many tense errors that the reader cannot determine if the story is taking place in the past or present.

9. Narrative Tense Evaluation of narrative tense across C-units; supplements the morphosyntactic analyses of SALT	
0 points – Unsatisfactory	- Numerous tense errors make it impossible for the reader to determine whether the story events are occurring in the present or occurred in the past.
1 point – Needs Improvement	- Correct tense is maintained for most of the story, but some errors exist. - Form errors are common. For example, the child uses *was* instead of *were*; *dived* instead of *dove*.
2 points – Satisfactory	- Maintains correct tense, no form errors, but story is short and simple - Or the story is longer, more complex, and maintains correct tense, but may have a couple form errors.
3 points – Excellent	- Tense is used correctly (consistent throughout the story and no form errors), **and the narrative contains at least one change in tense that is appropriately implemented** (cannot be a character quote: e.g., *Sally said, "We need to go"*).

Notes

- Form errors are errors where correct tense is attempted, but the wrong word is used (e.g., *Once there was three friends at the lake. The boy droppeded his lollipop on the ground*).

- The correct tense is established in the first C-unit. If the first C-unit is in past tense, the remainder of the story should be in past tense unless present tense becomes appropriately implemented.

10. Vocabulary

The "Vocabulary" category assesses the child's use of correct and interesting vocabulary and descriptive words.

Scoring

If colorful language and an impressive range of vocabulary is evident, **3** points are given. **2** points are given to narratives that do not use the same word too frequently. Stories that contain a small range of vocabulary are given **1** point. Lastly, **0** points are given if the same words are used repeatedly.

10. Vocabulary	
0 points – Unsatisfactory	- The same words are repeated throughout the narrative - Limited range of vocabulary
1 point – Needs Improvement	- Small range of vocabulary - Some words may be used too many times
2 points – Satisfactory	- Age-appropriate vocabulary used - Contains a few higher-level vocabulary words
3 points – Excellent	- Uses many sophisticated higher-level vocabulary words - Impressive range of vocabulary – well above grade level

Notes
- Vocabulary can be nouns, adverbs, or adjectives used to describe something.
- Words and phrases used incorrectly (semantic errors) do not receive credit.

11. Ending

The "Ending" category assesses how well a narrative is tied together using a clear and appropriate ending. A moral of the story constitutes an excellent ending. General statements such as "the end" are only appropriate if the story has first been summarized, or a statement tying the ending into the overall plot is given.

Scoring

If the child provides the audience with a moral of the story, **3** points are given. A clear and appropriate ending such as a summarizing statement or final reactions of the characters warrants **2** points. **1** point is given if the narrative ends unexpectedly without any summarizing statements. **0** points are given if no ending is provided, leaving the reader unsure if the story is over.

11. Ending	
0 points – Unsatisfactory	- No clear ending to the narrative - Reader is unsure of whether or not story has ended
1 point – Needs Improvement	- Abrupt, unexpected ending - No summarizing statement(s) - May end with a general statement (e.g., *the end*) before the story seems like it should be over
2 points – Satisfactory	- Child provides summarizing statement(s), final reactions of the character(s) etc. - May have a general ending statement as well, but this is not necessary
3 points – Excellent	- Child provides a moral and a clear ending

12. Cohesion

The "Cohesion" category assesses how well utterances are tied together to develop a narrative that is easy for the reader to follow. Specifically, this category focuses on the use of cohesive conjunctions. Instances of non-cohesive conjunctions are disregarded when choosing a score in this category (see examples in the Notes section of the table below).

Scoring

If cohesive conjunctions are used correctly throughout a longer, more complex narrative that is easy to follow and has received a 3 for Plot, **3** points are given. **2** points are given to shorter, simpler narratives that contain correct use of cohesive conjunctions, and longer more complex narratives that could benefit from additional cohesive conjunctions. If cohesive conjunctions are attempted, but used incorrectly overall, creating a story that sounds choppy, **1** point is given. If cohesive conjunction use is not attempted, **0** points are given.

12. Cohesion	
0 points – Unsatisfactory	- No use of cohesive conjunctions
1 point – Needs Improvement	- Cohesive conjunction attempts are made but significant error(s) exist - Story sounds choppy
2 points – Satisfactory	- Cohesive conjunctions are used correctly and when appropriate, but the story is short and simple - Or the story is longer and more complex, but cohesive conjunctions are used incorrectly and/or not as often as they could be
3 points – Excellent	- Story is longer and more complex, and cohesive conjunctions are used correctly and the narrative is easy to follow - **Must have a Plot score of 3 to get a 3 in this category**

Notes
- Examples of conjunction errors
    - *I did my laundry but I did the cleaning.*
    - *I did my laundry because I did it before the cleaning.*
- Coordinating conjunctions are non-cohesive conjunctions and should be disregarded
    - Noncohesive (coordinating) "and"
        - *I did my laundry and I cleaned the house.*
    - Cohesive "and"
        - *I did my laundry and there was a lot to do.*
- Most frequently used conjunctions: *and, then, so, but*
    - Other conjunctions:
        and also, nor, or, or else, furthermore, in addition, besides, by the way, that is, I mean, in other words, for instance, in the same way, on one hand, on the other hand, next, after that, previously, finally, at last, soon, at this moment, up to now, from now on, therefore, for this reason, otherwise, yet, though, only, except, in fact, actually, instead, anyhow, well, now, of course, anyway