Academic Language: PACT

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Guiding Questions

- What are we calling “Academic Language”
- What are Functions, Forms and Fluency?
- How do we support teacher candidates’ instruction and analysis of their work vis-à-vis Functions, Forms and Fluency?
Goals

- In this workshop teacher educators will be introduced to a functional approach to academic language, drawing from the work of Dutro & Moran (2003).

- The presenters will share how they teach this approach to AL in methods courses, and how they support teacher candidates’ ability to critically examine their own instruction for academic functions, forms and fluency.

- Participants will have the opportunity to examine a lesson plan template that explicitly embeds elements of Academic Language.
The problem...

While “being literate” in each of the disciplines is a central tenet of each set of standards, literacy is not defined explicitly. Rather, the definition is implied throughout the standards in terms of what K-12 students need to know, understand and be able to do.

- Tuyay, 2000
Therefore…

- Academic language must be intentionally and explicitly taught to all K-12 students.
- Merely being exposed to, or even engaged in, an activity in English is not sufficient to ensure academic success (Doughty & Williams, 1998; Scarcella, 1998).
- This doesn’t mean teaching “traditional” grammar, meaningless skill exercises, breaking language into its component parts of speech, or the separation of reading, writing, listening and speaking (Gibbons, 2002).
- It means that teacher candidates must reflect on how language is used for a range of purposes in their lessons.
What is language?

We asked the teacher candidates to consider these questions.

<table>
<thead>
<tr>
<th>Why?</th>
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<td>How?</td>
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What is language?
We then moved to this frame.

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What is academic language?

And, why does it matter?
What AL is/is not…

- We would ask policy makers and professionals, “What do you mean when you refer to academic language?”
- Typical response: “Well, you know…it’s the language needed for math and social studies.”
- We argued that the language of math ≠ the language of social studies.
- We also knew that how language is used in expository texts ≠ how language is used in narrative texts.
In social studies, long sentences with multiple embedded clauses are common.

Frequent use of pronouns *it* and *they* as referents.

Cause and effect statements are frequent.
- **Because** there will be more people in the world in the future, we will need more land on which to build towns and cities.

Various verb forms are used:
- “I found Rome a city of bricks and left it a city of marble.”
- Augustus is supposed to have spoken these words as he lay dying. He was Rome’s first emperor, and started the first of its great building programs. He claimed that he had had over 80 temples rebuilt.
Science

- Use of passive voice

- Multiple embeddings

- Long noun phrases serving as subjects or objects

- If…then constructions and logical connectors (if, because, however, consequently)

- The Calvin cycle is sometimes referred to as the “light-independent reactions” because, unlike the light reactions, it does not require light to begin. However, this does not mean that the Calvin cycle can continue running in a plant kept in the dark. The Calvin cycle requires two inputs supplied by the light reactions, ATP and NADPH.
Mathematics

- Comparatives:
  - 6 is greater than 4
  - Maria earns six times as much as Peter
  - Lin is as old as Roberto

- Prepositions:
  - (divided) into, divided by,
  - 2 multiplied by 6 and X exceeds 2 by 7

- Passive voice:
  - X is defined as a number greater than 7.

- Reversals: The number a is five less than b.

- Logical connectors: if…then
  - If a is positive then -a is negative.
Why does AL matter?

- Even a fluent speaker of English will not be proficient in every possible context (e.g. consider subjects that you might know little about, or perhaps a particular form of writing...dissertation, academic journal article, etc.).
- Academic tasks influence academic language discourse styles (registers).
- It is not simply a matter of getting the basic “grammar” correct, but of knowing the most appropriate language to use in the given context and of the appropriate ways to “get things done.”
What are Functions, Forms & Fluency?
Functions, Forms & Fluency


- Introduces the notions of **functions** (tasks), **forms** (tools) and **fluency** (derived from opportunities to practice).
Academic Language Functions

- **Functions** (Dutro & Moran, pp. 232-233)
  - The tasks or purposes AND uses of language.
  
  - We use language to accomplish something in formal or informal settings, for social or academic purposes.
  
  - Social purposes include: exchanging greetings, expressing needs, making jokes, indicating agreement or disagreement, participating in personal conversations, etc.
Academic Language Functions
Chamot and O’Malley, 1974

- **Seek Information** - use who, what, when, where, how
- **Inform** - recount information or retell
- **Compare** - explain graphic organizer showing contrast
- **Order** - describe timeline, continuum or cycle
- **Classify** - describe organizing principles
- **Analyze** - describe features or main idea
- **Infer** - generate hypotheses to suggest cause/outcomes
- **Justify & Persuade** - give evidence why “A” is important
- **Solve Problems** - describe problem-solving procedures
- **Synthesize** - summarize information cohesively
- **Evaluate** - identify criteria, explain priorities, etc.
Identifying Academic Language Functions

- Credential candidates need to identify the essential academic language function required of students in order for them to adequately express their developing understanding of the newly learned content.
Identifying Academic Language Functions

- To identify the AL functions we ask credential candidates to look at the following areas of their lesson plans:
  - Learning objectives
    - Academic Content
    - Academic Language
  - Assessment
Identifying Academic Language Functions

- The **learning objectives** in the Marine Mammals/Ocean Fish lesson plan:

- Given a brief lecture and a Venn Diagram brainstorm, learners will be able to state at least one commonality and one difference between marine mammals and ocean fish.
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Identifying Academic Language Functions

- The **academic language objectives** in the Marine Mammals/Ocean Fish lesson plan:

  - Given a Venn Diagram brainstorm and sentence frames, learners will be able to **state in a complete sentence** at least **one commonality** and **one difference** between marine mammals and ocean fish.
Forms

- Content-specific vocabulary

- The words that hold our language together and are essential to comprehension. They are **words that determine relationships** between and among words.
For example...

- **Connecting words:** because, then, but, sometimes, before, therefore, however and whereas

- **Prepositions and prepositional phrases:** on, in, under, behind, next to, in front of, between, among and in the background

- **Basic regular and irregular verbs:** leave, live, eat, use, saw, and went

- **Pronouns:** she, he, his, their, it, each other, and themselves

- **Academic vocabulary:** notice, think, analyze, plan, compare, proof, and characteristics
Function: Compare/Contrast

Marine Mammals
- have lungs
- have live births
- are warm blooded
- the mothers produce milk
- are vertebrates
- are excellent swimmers
- live in groups
- do not produce milk

Ocean Fish
- have gills
- hatch from eggs
- are cold blooded
- live in groups
- do not produce milk
Function: Compare/Contrast

- Providing sentence frames will allow students to express compare/contrast.
  
- _________ have ____________, whereas _________ have ________________.
  
- **Marine mammals** have **lungs**, whereas **ocean fish** have **gills**.
Fluency

- The facility with which a speaker, reader and writer uses language.

- Developed through focused and deliberate engagement with a range of uses of language (both oral and written), and many opportunities to practice the newly learned forms in different contexts.
  - Dutro and Moran, page 242
Academic Language

In the context of lesson design
Lesson Design Frame

- We retooled our Lesson Design Frame to hold TCs accountable for addressing academic language in their practice.
  - Identify academic language objectives
  - Identify academic language functions within learning objectives
    - What are K12 students being asked to do through language?
  - Identify corresponding forms
    - What are the sentence frames K12 students need in order to express their understanding of the content being taught?
  - Identify opportunities for students to express academic language
    - When, where and with whom they are using language?
Analysis of Lesson Plan Template

- You have a copy of the first two pages of a lesson plan template.

- This is part of the process that teacher candidates use to analyze their teaching vis-à-vis academic language.

- We will then look at the PACT rubrics for AL.
Lesson Plan Cycle

- Lesson plan
  - Guiding questions for learning objectives as well as language objectives

- Peer Analysis and Feedback
  - Draft
  - Using guiding questions on peer analysis worksheet

- F-F-F Analysis
  - Responding to questions on F-F-F analysis worksheet

- Instructor Feedback
  - Per Lesson Design Frame
What have we learned?

- Through a reflexive process, and in dialog with colleagues in teacher education, we continue to explore ways that we can better support teacher candidates’ ability to critically examine their own instruction for academic functions, forms and fluency.
  - We have intentionally integrated explicit attention to AL in the lesson design frame.
  - Supervisors and instructors all are familiar with and employ this common lesson design frame.
  - In methods courses, teacher candidates analyze their own lessons for Academic Language vis-à-vis
    - Academic functions,
    - Explicit attention to the forms students need to express their understanding of the content,
    - Opportunities for students to develop fluency in their expression of academic language functions and their ability to articulate their new learning of the content.
Application: PIAR

Planning
Instruction
Assessment
Reflection
PACT:
- Context
- Planning
- Instruction
- Assessment
- Reflection

12 Rubrics:
- Context
- Rubrics 1,2,3
- Rubrics 4,5
- Rubrics 6,7,8
- Rubrics 9,10
- Rubrics 11,12

Academic Language
(support embedded throughout cycle)

Rubrics 11,12
(scored with evidence from all parts of teaching event)
For PACT, there is not a specific section or task that asks about the Academic Language.

Therefore, Academic Language needs to be embedded throughout the lesson plan, and is scored as such.

It should be embedded in:
- TASK 2: Planning Instruction and Assessment and Planning Commentary
- Task 3: Instruction
- TASK 4: Assessing Student Learning and Commentary
# PACT - Rubric 11: Understanding Language Demands

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<th>Level 3</th>
<th>Level 4</th>
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| **Candidate’s description of students’ academic language proficiency at lower levels is limited to what they CANNOT do.**
| **Candidate describes academic language strengths and needs of students at different levels of proficiency.**
| **Candidate identifies unfamiliar vocabulary without considering other linguistic features.**
| **Candidate did not identify any language demands within the learning and assessment tasks.**
| **Language genre(s) discussed are only tangentially related to the academic purposes of the learning segment.**
| **The language genre(s) discussed are clearly related to the academic purposes of the learning segment and some language demands are identified.**
| **Candidate identifies vocabulary that may be problematic for students.**
| **OR**
| **Candidate describes academic language strengths and needs of students at different levels of proficiency.**
| **The language genre(s) discussed are clearly related to the academic purpose of the learning segment and language demands are identified. One or more linguistic features and/or textual resources of the genre are explicitly identified and related to students’ varied levels of academic proficiency.**
| **Candidate identifies essential vocabulary for students to actively engage in specific language tasks.**
| **Candidate identifies instruction related clusters of vocabulary.**
| **Candidate describes academic language strengths and needs of students at the full range of academic language proficiency.**
| **The language genre discussed is clearly related to the academic purpose of the learning segment and language demands are identified. One or more genre-related linguistic features or textual resources of the specific task/materials are explicitly identified and related to students’ varied levels of academic proficiency.**
| **Candidate identifies instruction related clusters of vocabulary.**
PACT - Rubric 11: Understanding Language Demands - Level 3

- Candidate describes academic language strengths and needs of students at different levels of proficiency.

- The language genre(s) discussed are clearly related to the academic purpose of the learning segment and language demands are identified. **One or more linguistic features and/or textual resources of the genre are explicitly identified.**

- Candidate identifies **essential vocabulary** for students to actively engage in specific language tasks.

- Context commentary and Planning commentary; Academic language development
  - Academic language functions identified.
  - Links forms to functions (content-specific language as well as general language forms)
  - Content-specific vocabulary and sentence frames
  - Having the sentence frames (forms) allow students to express their learning (through functions)
## PACT - Rubric 12: Supporting Academic Language Development

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<td>* The candidate gives <strong>little or sporadic support to students</strong> to meet the language demands of the learning tasks. OR * Language and/or content is <strong>oversimplified</strong> to the point of limiting student access to the core content of the curriculum</td>
<td>* The candidate uses scaffolding or other support to <strong>address identified gaps</strong> between students’ current language abilities and the language demands of the learning tasks and assessments, including selected genres and linguistic features. * Candidate articulates why instructional strategies chosen are likely to support aspects of students’ language development.</td>
<td>* The candidate’s use of scaffolding or other support provides access to core content while also providing <strong>explicit models, opportunities for practice, and feedback for students to develop further language proficiency</strong> related to the demands of the learning tasks and assessments. * The candidate articulates why the instructional strategies chosen are likely to support <strong>specific aspects</strong> of students’ language development for the <strong>full range</strong> of language proficiencies and <strong>projects ways in which the scaffolds can be removed</strong> as proficiency increases.</td>
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Rubric 12: Supporting Academic Language Development - Level 3

- The candidate’s use of scaffolding or other support provides access to core content while also providing **explicit models, opportunities for practice, and feedback** for students to develop further language proficiency related to the demands of the learning tasks and assessments.

- The candidate **articulates why** the instructional strategies chosen are likely to support **specific aspects** of students’ language development for **different levels** of language proficiency.

- Sentence Frames, Two-way interactions

- Purposes column of our template
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