Take a Walk In Their Shoes

- Read the following article from *Oxford Medical Journal*
- **Underline** any unknown words
- *When your comprehension breaks down*

3 Biggest Areas of Difficulty

Vocabulary
Background Knowledge
Presentation of Content
Identifying synergistic regulation involving c-Myc and sp1 in human tissues

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Next Section

Abstract

Combinatorial gene regulation largely contributes to phenotypic versatility in higher eukaryotes. Genome-wide chromatin immuno-precipitation (ChIP) combined with expression profiling can dissect regulatory circuits around transcriptional regulators. Here, we integrate tiling array measurements of DNA-binding sites for c-Myc, sp1, TFIID and modified histones with a tissue expression atlas to establish the functional correspondence between physical binding, promoter activity and transcriptional regulation. For this we develop SLM, a methodology to map c-Myc and sp1-binding sites and then classify sites as sp1-only, c-Myc-only or dual. Dual sites show several distinct features compared to the single regulator sites: specifically, they exhibit overall higher degree of conservation between human and rodents, stronger correlation with TFIID-bound promoters, and preference for permissive chromatin state. By applying regression models to an expression atlas we identified a functionally distinct signature for strong dual c-Myc/sp1 sites. Namely, the correlation with c-Myc expression in promoters harboring dual-sites is increased for stronger sp1 sites by strong sp1 binding and the effect is largest in proliferating tissues. Our approach shows how integrated functional analyses can uncover tissue-specific and combinatorial regulatory dependencies in mammals.
Just the Facts

• The “Big Picture”- 30 million adults are functionally illiterate and another 63 million don’t read well enough to read an 8th grade newspaper.

• National- 33% of 4th grade students are below “Basic” level on NAEP Reading Test

• New Jersey- 15% of total # of students in NJ are classified.

• Stafford- McKinley and Intermediate School combined have over 140 I&RS students AND over 260 special education students

• Most Science and Social Studies textbooks readability level averages between 1-2 grade levels above (Example: Grade 3 book-RL4-5)
Before Reading Strategies
Activate Background Knowledge
“What does that word mean?”

Struggling readers struggle most in the content areas because of their lack of vocabulary development.

Previewing Vocabulary helps students:

- Activate prior knowledge
- Become engaged
- Start to ask questions about the topic
Strategies for Teaching Vocabulary

- Graphic Organizers
- Games (Spellingcity.com)
- Word Maps
- Word Walls
- Repetition
During Reading Strategies
Achieve 3000

- Encompasses the entire classroom- providing the same topics and lessons to all students while teaching students one-on-one at their individual Lexile levels
- Delivers differentiated assignments at 12 different reading levels, along with formative assessments linked to Common Core and state standards
Storyworks
storyworks.scholastic.com

- **New Issues** - Fiction, Nonfiction, Paired Texts, Readers Theatre, Debate, Grammar Skill, Poem, Infographic, Editing/Revising, and Vocabulary

- **Students View** -
  - Current and Archived Issues
  - Listen to some of the articles
  - Watch videos that pair

- **Teacher View** -
  - Teacher Guide
  - Whiteboard versions On and Below Level
  - Activites and Quizzes (can be leveled)
  - Audio for On and Below Level
  - Objectives and Standards
● Printable and Projectable Leveled Readers (27 Levels of Difficulty)
● Books and Resources correlated to the Common Core Standards
● Project Based Learning Packs
● Paired Books
● Theme and News Packs
● Close Reading Packs
● Graphic Organizers
After Reading Strategies
Different Types of Assessment

● Break into groups according to your grade level or the grade level you work with
  ○ Brainstorm ideas of ways you differentiate your tests
  ○ Different forms of assessments (i.e. projects, exit slips, speeches)

● Show and Share
Quick Reference

- Achieve 3000
  - www.achieve3000.com
  - Username: mpan4t
  - Password: mpan4t

- Storyworks
  - http://storyworks.scholastic.com
  - Username: mhoffman@staffordschools.org
  - Password: mustangs
  - Student Login: mckinley15

- Reading A-Z
  - www.readinga-z.com
  - Username: staff08050b-007
  - Password: reading