

How To Give a Job Talk

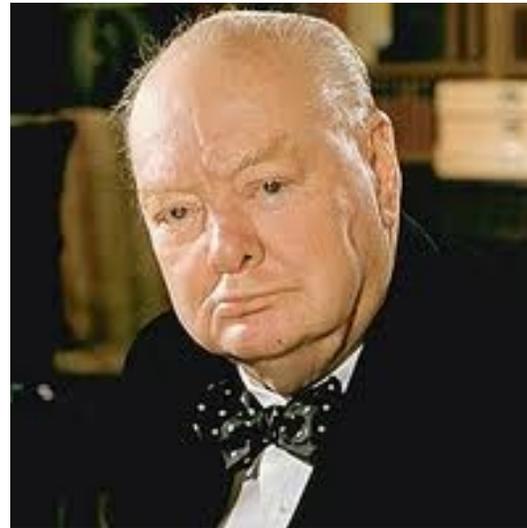
Stephen J Heishman, PhD
Office of Education and Career Development
NIDA Intramural Research Program

7 November 2012



NIDA NATIONAL INSTITUTE
ON DRUG ABUSE

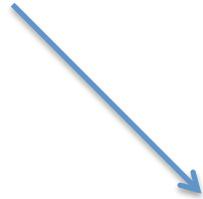
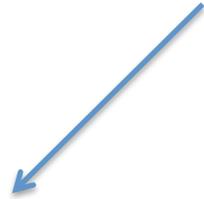
“There are two things more difficult than making an after-dinner speech: climbing a wall leaning toward you and kissing a girl leaning away from you.”



Surveys show that the #1 fear of Americans is public speaking. Death is #2. That means that at a funeral, the average American would rather be in the casket than doing the eulogy.

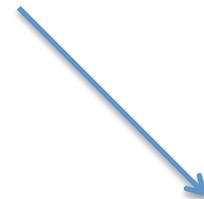
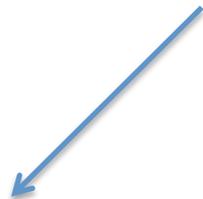


Science



Doing
(objective)

Communicating
(subjective)



Substance
(objective)

Style
(subjective)

Arouse and Fulfill

Arouse (style) and Fulfill (substance)

- Hook the audience
- Fulfill their expectation
- Motivate, then educate

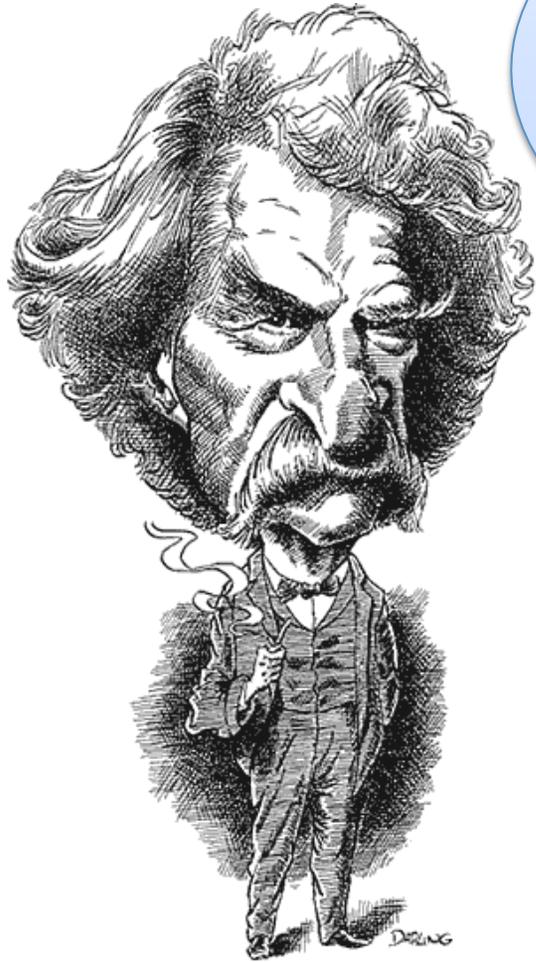
10 Steps to a Darn Good Job Talk

Preparing Your Talk



Rule 1: Know Your Audience

- Audience determines talk
- For job talk, ask:
 - How many?
 - Who?
 - Backgrounds?



It usually takes me more than three weeks to prepare a good impromptu speech.

Rule 2: Don't Procrastinate

- Make a schedule
- Same as writing a paper
- Set aside time each week

Weeks before talk	Activity
6	Background reading
5	Outline talk
4	Make slides
3	Practice
2	Revise
1	Final practice

Rule 3: Outline Your Talk in 3 Acts

- Act One
 - Hook, intro, your question & hypothesis
- Act Two
 - Things happen, methods & results
- Act Three
 - Interpretation & synthesis

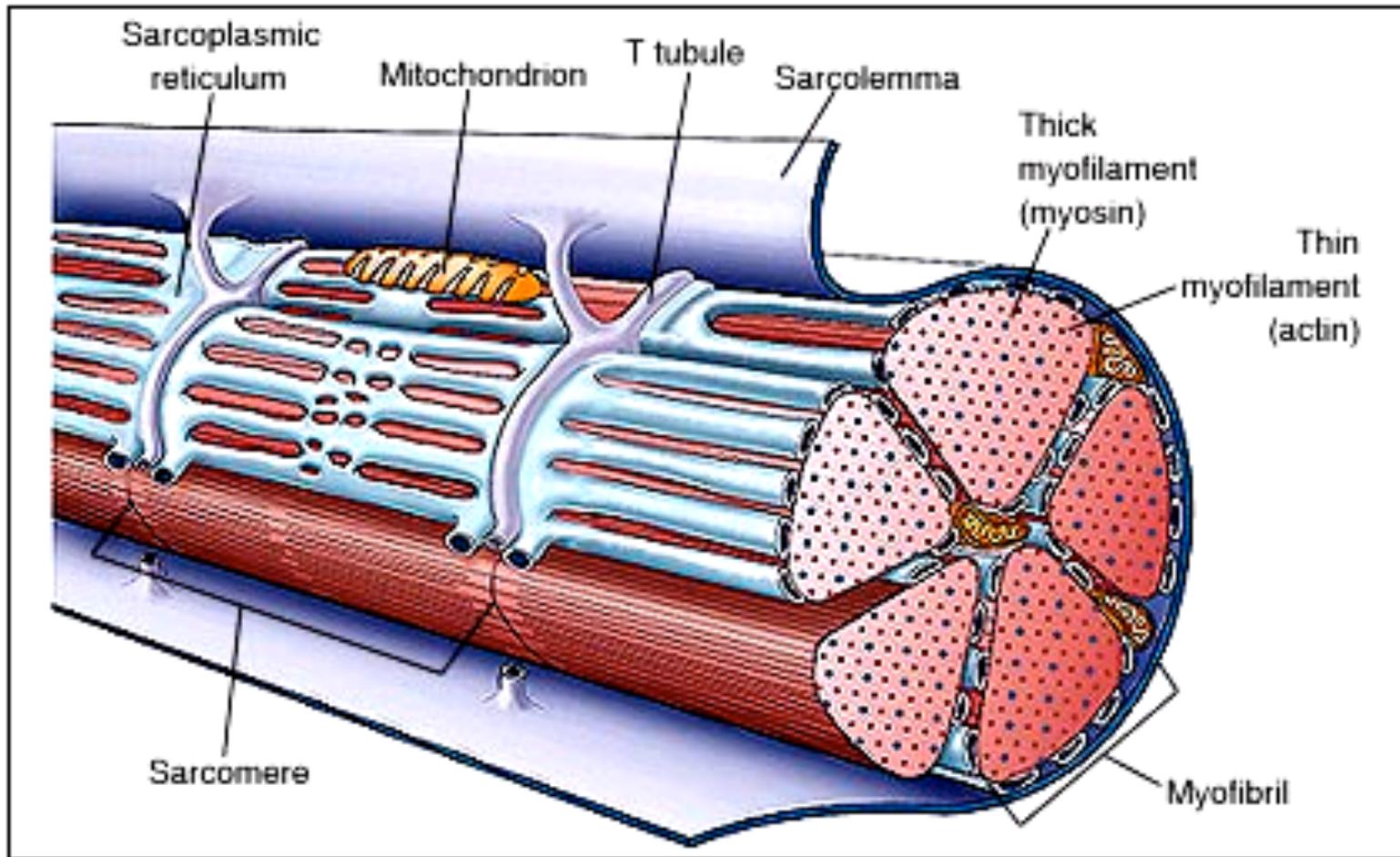
Going From Outline to PowerPoint

- Descriptive title; slides are prompts
- 4-6 bullets, 5 words per bullet
- Arial, Helvetica, Calibri, Times
- Titles: 36-44 pt, text: 24-36 pt
- Black text on white background
- Graphs & labels easily readable

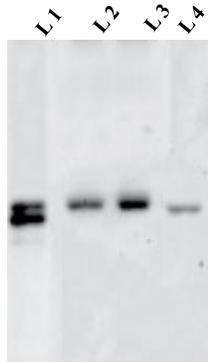
Muscle Contraction

- A specialized endoplasmic reticulum called the sarcoplasmic reticulum (SR) surrounds each myofibril, following the sarcomeric pattern while maintaining an association with the the t-tubules.
- The SR acts as a calcium storage reservoir for the facilitation of muscle contraction through the release of calcium through the calcium release channel.
- The brain sends an electrical signal along the muscle sheath and down the T-Tubule. This signal initiates calcium release.
- The binding of calcium within the myofilament arrangement allows for binding between the myofilaments resulting in the sliding of the filaments which is known as contraction.
- For relaxation, calcium is removed via the sarcoplasmic reticulum's calcium pump causing the myofilaments to move to their original positions resulting in the relaxation of the muscle

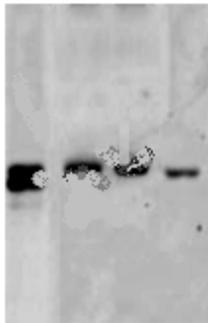
Muscle contraction is facilitated by Ca^{2+}



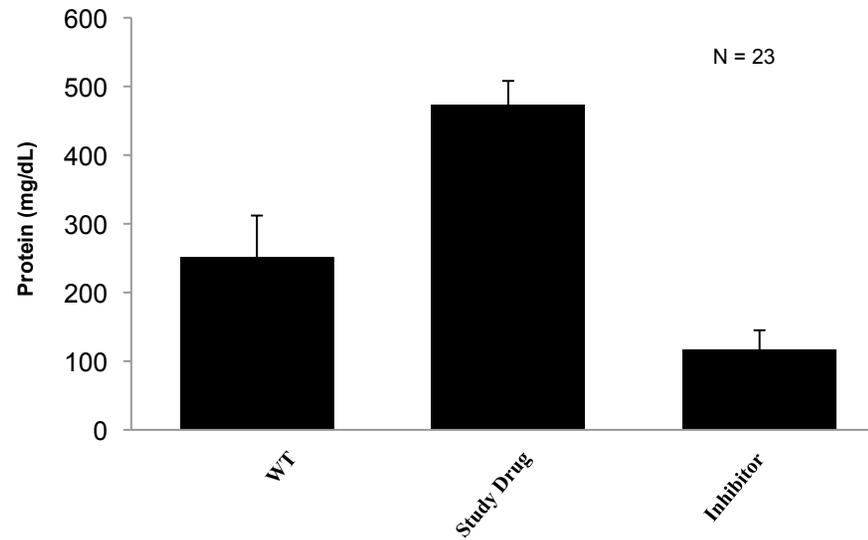
Results



Trial 1

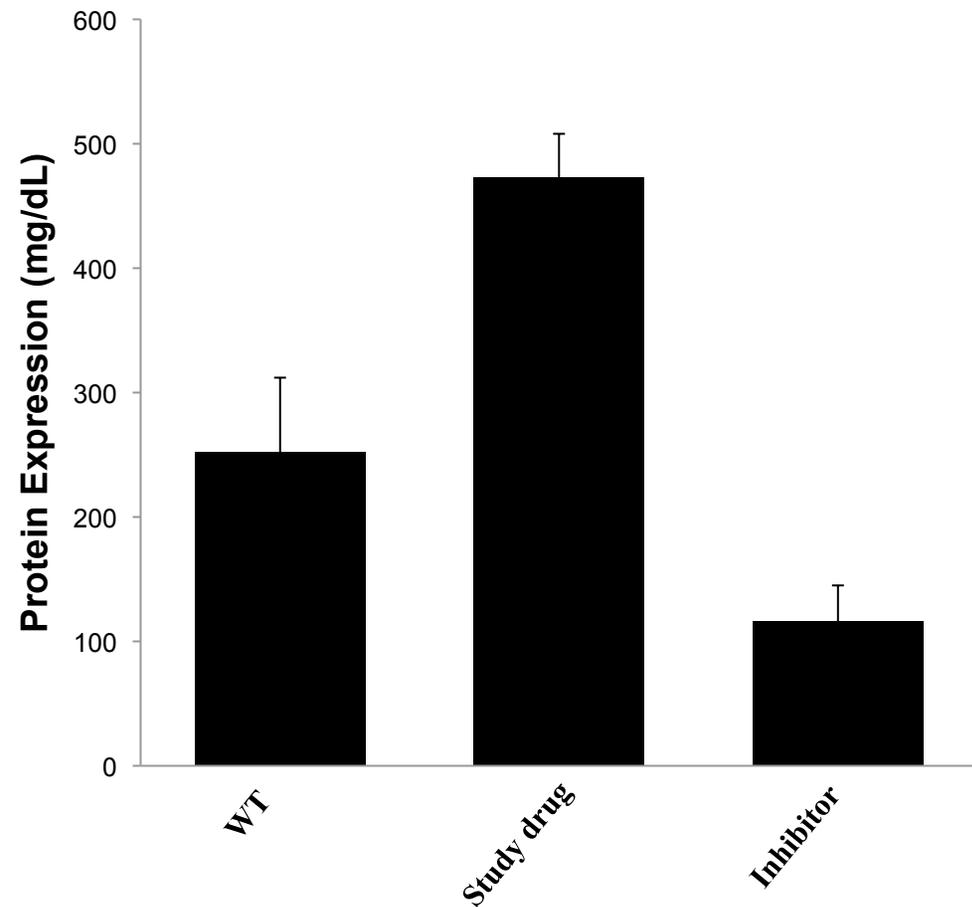
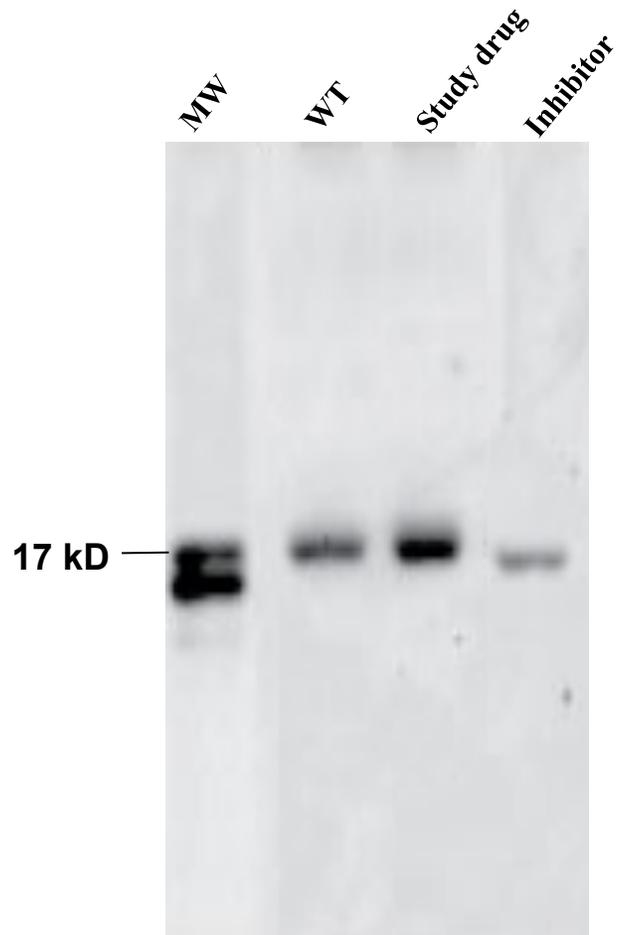


Trial 2



- 50 μ M of study drug with 40 min incubation at 34o C
- Gel electrophoresis
- Western blot analysis
- Study drug increases protein expression as opposed to wild type

Study drug stimulates protein expression



N = 23

Rule 4: Practice Early and Often

Practice

Practice

Practice

Delivering Your Talk



Rule 5: Managing Your Anxiety

- Preparation & practice → confidence
- Imagery exercises
- Visit room before talk
- Arrive early & run through slides
- Relaxation, deep breathing
- Audience is your friend

Rule 6: Don't Read Your Slides

Corollary 6a: Look at audience

Muscle Contraction

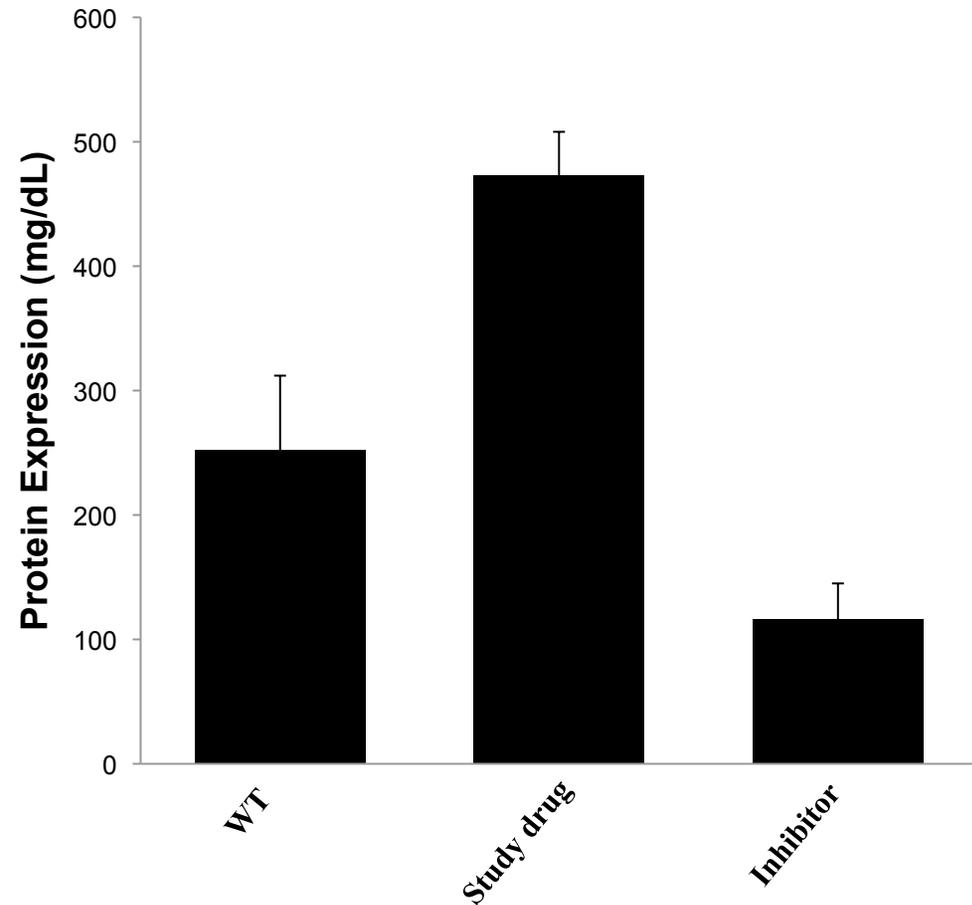
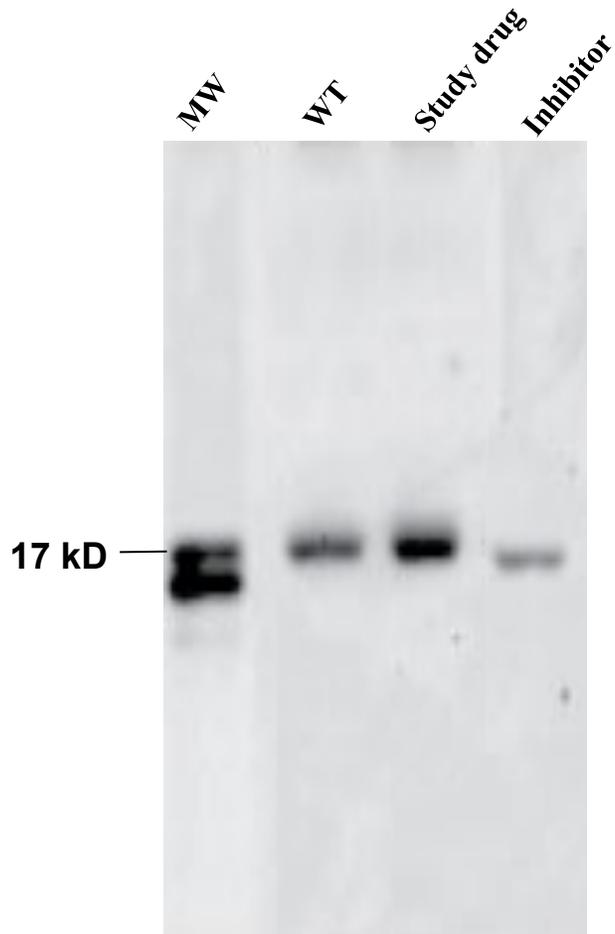
- A specialized endoplasmic reticulum called the sarcoplasmic reticulum (SR) surrounds each myofibril, following the sarcomeric pattern while maintaining an association with the the t-tubules.
- The SR acts as a calcium storage reservoir for the facilitation of muscle contraction through the release of calcium through the calcium release channel.
- The brain sends an electrical signal along the muscle sheath and down the T-Tubule. This signal initiates calcium release.
- The binding of calcium within the myofilament arrangement allows for binding between the myofilaments resulting in the sliding of the filaments which is known as contraction.
- For relaxation, calcium is removed via the sarcoplasmic reticulum's calcium pump causing the myofilaments to move to their original positions resulting in the relaxation of the muscle

Rule 6: Don't Read Your Slides

Corollary 6a: Look at audience

Corollary 6b: Don't put on a laser show

Study drug stimulates protein expression



N = 23

Rule 7: Respect Your Audience

- Don't **EVER** run over time
 - Talk for 75-80% of total time
 - About 1 slide per minute
- Don't **EVER** apologize for a slide

Rule 9: Tailor Your Conclusion

- Future research at institution
- How research involves students
- Collaborating with faculty
- Grant ideas and sources
- Emphasize your fit

Rule 9: Anticipate Questions

- Boundaries of your research
- Theory & Practice
- Past & present
- Quirky questions

Rule 9: Anticipate Questions

Boundaries of your research

- How did you measure . . . ?
- Would you get the same result if you . . . ?
- Would your results generalize to . . . ?

Rule 9: Anticipate Questions

Theory & practice

- Do you think this research could help . . . ?
- What are some practical implications?
- Would your results support X theory?

Rule 9: Anticipate Questions

Past & present

- Where will you go next with your research?
- How do you see your results in relation to past work in this area?

Rule 9: Anticipate Questions

Quirky questions

- Person making a statement
- “Let’s talk after the session.”
- Ask to repeat a confusing question
- Find a grain of relevance
- OK to say, “I don’t know.”

Rule 10: Smile

- Be likeable
- Critical for job talk
- Job talk is about YOU, not research
- Treat every talk as a job talk

10 Rules for Job Talk Success

1. Know your audience
2. Don't procrastinate
3. Outline your talk
4. Practice early & often
5. Manage your anxiety

10 Rules for Job Talk Success

6. Don't read your slides
7. Respect your audience
8. Tailor your conclusion
9. Anticipate questions
10. Smile!

Two Good Books

Don't Be *Such* a Scientist – Randy Olson

Public Speaking for Psychologists – David
Feldman and Paul Silvia