

How To Write an Effective Abstract

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In this project, I am _____.

This is likely *not* how you will want your abstract to begin...



Today...

- Look over some abstracts
- Introduce the CaRS Model as a guide for drafting abstracts (*especially* abstracts intended to inform a broad audience)
- Generate some text about your project
- Offer some overall advice/caveats for (continuing) your work

Discovery of a big void in Khufu's Pyramid by observation of cosmic-ray muons (246 words)

The Great Pyramid, or Khufu's Pyramid, was built on the Giza plateau in Egypt during the fourth dynasty by the pharaoh Khufu (Cheops), who reigned from 2509 bc to 2483 bc. Despite being one of the oldest and largest monuments on Earth, there is no consensus about how it was built. To understand its internal structure better, we imaged the pyramid using muons, which are by-products of cosmic rays that are only partially absorbed by stone. The resulting cosmic-ray muon radiography allows us to visualize the known and any unknown voids in the pyramid in a non-invasive way. Here we report the discovery of a large void (with a cross-section similar to that of the Grand Gallery and a minimum length of 30 metres) situated above the Grand Gallery. This constitutes the first major inner structure found in the Great Pyramid since the nineteenth century. The void, named ScanPyramids' Big Void, was first observed with nuclear emulsion films installed in the Queen's chamber, then confirmed with scintillator hodoscopes set up in the same chamber and finally re-confirmed with gas detectors outside the pyramid. This large void has therefore been detected with high confidence by three different muon detection technologies and three independent analyses. These results constitute a breakthrough for the understanding of the internal structure of Khufu's Pyramid. Although there is currently no information about the intended purpose of this void, these findings show how modern particle physics can shed new light on the world's archaeological heritage.

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U.S. Spanish-Language Television Management during the Industry's First 50 Years (111 words)

Many people were stunned to learn the Spanish-language television network Univision was the highest rated in prime time among all U.S. networks in July 2013, a feat it repeated a year later. Steady growth of its demographic and advertising bases, combined with astute management, has brought success to this dynamic industry sector. However, the boom years were preceded by several decades of formidable challenges and lean periods. This article examines the principal technological, programming, financial and competitive obstacles network management faced from the 1970s to the 2000s, illustrating the variety of fronts on which ethnic-oriented media leaders maneuvered during a period of rapid population growth and industry transformation.

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With A Little Help from My Friends: Perceived Task Interdependence, Coworker Communication, and Workplace Friendship (111 words)

Workplace friendships are primary sites of organizing associated with important outcomes including cohesive climates, creativity and innovation, and employee job satisfaction. Research indicates the workplace context influences the initiation of workplace friendships via physical proximity and shared projects. The present study demonstrates how another context variable - perceived task interdependence (PTI) - influences both the initiation and the continued development of workplace friendships into closer levels. The links between PTI and workplace friendship were examined, centering on communication (frequency and channel) and trust as mediating variables. PTI was associated with both the initiation and development of workplace friendships. Moreover, the link between PTI and friendship closeness was fully moderated by communication and trust. Results also demonstrated that asymmetric PTI (i.e., one coworker is more/less dependent on the other) influenced trust, but only for non-friend coworkers. Friendship appears to buffer the relationship from potential negative effects of asymmetry.

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Create a Research Space (CaRS) Model of Research Introductions

According to John Swales: In academic writing, writers introducing their research tend to perform the same sequence of moves (regardless of discipline or area of research):

Move 1: Establishing a Territory

Move 2: Establishing a Niche

Move 3: Occupying the Niche

Although CaRS dictates three moves, there is variation in execution of each

Identifying/centering a topic
and its importance

Move 1: Establishing a Territory

Providing some background
info

In an abstract this is *typically*
a broad reference to existing/
current research: "Current
research supports..." or
"Many studies have found..."

(1) Claiming Centrality *and/or* (2) Making Topic Generalizations *and/or* (3) Reviewing Previous Items of Research

Move 2: Establishing a Niche

(1) Counter-claiming *or* (1b) Indicating a Gap *or* (1c) Question Raising *or* (1d) Continuing a Tradition

Move 3: Occupying the Niche

(1a) Outlining Purposes *or* (1b) Announcing Present Research; (2) Announcing Principle Findings (which can include preview of significance)

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Territory
Centrality, Background

Niche
Gap

Notice how establishing the niche is a way of transitioning from broader context to specific work!

Occupation (of niche)
Work done, findings...

U.S. Spanish-Language Television Management during the Industry's First 50 Years

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Territory

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Niche
(Gap/unknown, *implicit*)

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Occupation
Work done

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Territory

Niche?

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The niche seems to be buried in the occupation (but we can get it!)

Occupation

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Design and Evaluation of an Open-source Gaze-controlled GUI for Web-browsing

Nowadays, motor-impaired people with Locked-In Syndrome (LIS) use eye-tracking technology to write and to access the web through commands generated by the detection of gaze movements and fixations on a graphical user interface (GUI). However, novel GUI concepts must be designed to further ease the control offered by eye-tracking, making it more responsive and less tiresome. This paper presents and evaluates an open-source standalone GUI design, SightWeb, that fully and easily controls a web browser through gaze movements without any page analysis. Its temporary menu centered in the area of action allows for reduced eye saccade and mental workload. SightWeb was evaluated against a state-of-the-art eye tracking based web interface (The Grid 3 by Thinksmartbox). The results (gaze movements, execution times, user experience questionnaire scores) suggest that SightWeb is quicker to learn and to use, more appreciated and less tiring than a traditional assistive GUI. This shows that the system can be, not only an improved interface for patients, but also an instrumental piece of software for researchers working in related areas.

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Territory

Centrality, Background

Niche

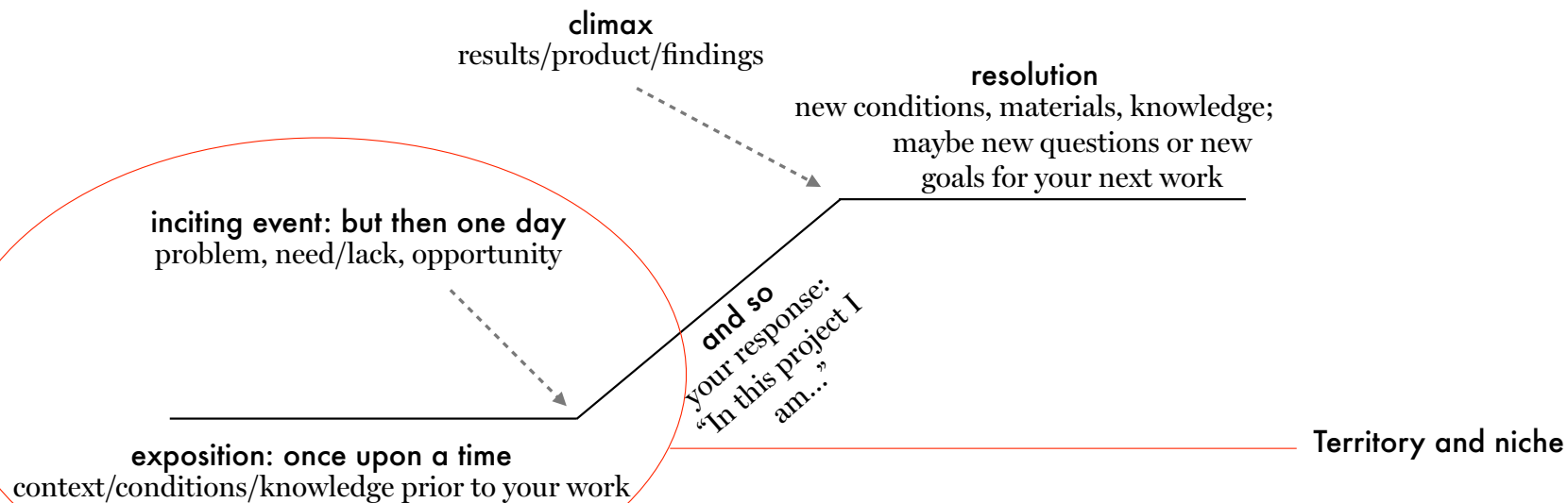
Gap, Continuing a tradition?
Notice again how establishing the niche is a way of transitioning from broader context to specific work!

Occupation (of niche)

Work done, findings
how the researchers are working to improve eye-tracking technology

Communicating science... the story of your work

Research/scientific/technical writing *is not* narrative writing, but your work often follows a common or expected pattern that is not dissimilar to basic narrative structure (which you were probably introduced to in a literature course at some point)



Move 1: What is the *territory* you are working in?

What should readers know about the context or origin of your work? List out some things you could include to depict the world of your work:

Think especially about *claiming centrality* (topic and importance) and *making topic generalizations* (background information): what existing conditions lead us to your research?

Note: In an abstract, any references to previous items of research are *usually* general/summarized/non-cited: "Previous research shows..."

*Imagine you are stepping back to explain this to a friend or family member who doesn't study/research what you do: what background info would set them up to appreciate what you are doing (and why)?

Move 2: What is your niche in this territory?

What's the problem or need or issue that motivates your work? How does your work fit into, arise from, or respond to the territory you established?

This is usually a single sentence—think about indicating a gap in knowledge or capability, raising a question, or explaining why you continue ongoing work...

(And, you might want to think that this sentence leads us to what you wrote at the start of this session: "In this project I am...")

** Words that establish opposition and contrast are useful—and common—when establishing a niche: **however, although, but, despite...***

Move 3: What work are you doing to occupy this niche?

This is the “easy” part: what are you doing?

What is the purpose/goal of your work?

What are you doing to carry it out?

If you have results/findings, you can preview these or forecast what you will do

*Will you use 1P pronouns (“we modeled”), 3P/ distanced constructions (“researchers modeled”) or passive elisions (“A model was developed...”)?

Abstracting advice

- Abstracts submitted for the DEGS Conference should be 150-250 words, and may include an image
- They are short... but shouldn't be a one-sitting project! Several short writing sessions are better than one long one
- Follow the CaRS model and select/shape material that shows readers the area/context of research (territory), how your research fits in (niche), and what you are doing/have done (occupation of the niche); if you can do this, readers will know *what* you are doing but also *why* it matters (the "so what?" of it)
- *Talk* to people (peers, friends and family) about your work (the CaRS model works in conversation, too!); talking is rehearsal for writing
- Write big and then work down: better to get all the important components on the page and *then* work it into shape and word limit (like a puzzle)
- Principles of clarity and concision apply: when possible/appropriate, use active voice... clear subjects and action verbs near the beginning of a sentence = fewer words and increased readability
- Consult with/get feedback from your advisor/peers about your draft and what is most appropriate (e.g., "To answer this question, we designed a..." vs. "To answer this question, researchers designed a...")
- Drexel Writing Center > Make an Appointment > Graduate Writing Consultants Schedule Winter 2025: **Schedule a one hour consultation to talk about and work on your abstract!**

