Systems: Lesson 1

# Systems in Arcadia

## Introduction

The play Arcadia is full of references to systems. In some cases discussion of the system drives the action of the play, in others a system is used to create a framework or background that helps us understand a character’s motivations or behavior. In this lesson you identify one particular system and develop an argument regarding the role of that system in the overall structure and outcome of the play.

## Objective

Your assignment is to select one of the systems introduced in Arcadia and write a short essay of between 500 and 750 words explaining how the system you have chosen helps you to understand the meaning of the play, advances the progress of the play, communicates conflict, illuminates the mental state of one of the characters or helps explicate some aspect of the human condition.

Be sure to support your argument with examples from the text!

## Discussion

We read Arcadia in this class as a case study. The value of doing this is to create examples of systems that all of us in the class share, and can expect to reference with the confidence that others in the class will know what we are talking about. This will be useful because the nature of systems is that their complexity makes it difficult to speak about them with others while being confident that you are actually talking about the same thing.

The fascinating thing about systems--demonstrated convincingly in Arcadia-- is that the structure, meaning or even existence of any system is not defined absolutely, but relative to the perspective of the individual who observes it. We see examples of this within the two timelines of the play and across them as well. For example, Thomasina is able to see the concept of fractals intuitively, whereas her teacher Septimus is not. Valentine, a character in the later narrative, understands fractals but cannot, at first, believe it possible Thomasina could have conceived the idea, however when he realizes that she did, this knowledge changes his perspective on her character.

In the end Arcadia is a love story, a story about the emotions of the characters that inhabit the play. And herein lies the most important system lesson in the play. The systems it describes provide frameworks and reference points for the play’s characters, but ultimately it is their emotions, not the systems they inhabit, that produce the uncertainty, unpredictability, richness and ultimate outcomes of the story.

You are free to write about any system that you can identify within the text of the play. To help you in your thinking, here are few possibilities to consider.

* Thermodynamics, specifically, the concept of entropy, as in Thomasina's statement "You cannot stir things apart (p.5)."
* Newtonian physics, as a deterministic system, as in Septimus's somewhat sarcastic question 'If everything from the furthest planet to the smallest atom of our brain acts according to Newton's law of motion, what becomes of free will (p.5)?'
* Classical mathematical theory, referenced in terms of Fermat's Theorem (p.6).
* Iterated algorithms or fractals as created by Thomasina and described by Valentine ‘She’s feeding the solution back into the equation, and then solving it again. Iteration, you see (p.44).’
* A system of analyzing text algorithmically to determine its source, as in the discussion between Bernard and Valentine (p.19).
* The waltz as the systematic series of movements through time that Thomasina wants to learn (p.80).
* The implicit 'rules' of academic historical and textual analysis that Bernard uses, and abuses (p.53).
* The system of acts and scenes which form the structure of the play itself.
* The system of objects shared between the two time lines in the play (p.15).
* Landscape architecture as a system for communicating changing world view’s, as Hannah states ‘The history of the garden says it all, beautifully (p.27).’

## References

After reading Arcadia, but before writing your essay, please read the critical evalution “Is Tom Stoppard's Arcadia the greatest play of our age?” <http://ind.pn/9AQzs>.

## Submission

1. A written essay of between 500 and 750 words describing how at least one system mentioned in Arcadia is instrumental to your understanding of the meaning of the play.
2. Post a PDF document that of your essay to Edmodo by 4pm Monday 27 January 2014.

## Learning Goals

* practice seeing a complex situation in terms of the distinct systems of which it is comprised
* practice developing and defending an hypothesis about the role of a system within the larger context that contains it
* practice communicating complex ideas in written form

## Grading Rubric

| **Dimension** | **Pass (1)** | **Fail (0)** |
| --- | --- | --- |
| Presentation | Meets length expectations, with a simple and easy to consume visual layout and the typography | Does not meet the requirement for length, or is sloppy, unattractive or otherwise difficult to read |
| Content | The essay clearly identifies a system, shows how it relates to the play as a whole, includes supporting examples drawn from the text for each of its points and can be read as a coherent and organized statement of opinion. | The essay does not clearly identify a particular system as a topic, does not offer a clear thesis regarding the relationship between the selected system and the play, does not include examples from the text, or otherwise fails to address the required topic. |
| Writing Skill | The writing contains minimal typographic errors and the relationships between sentences, paragraphs and the overall structure help the reader understand the essay's meaning. | The essay is poorly written, contains many spelling and/or grammatical errors, is disorganized or otherwise fails to present ideas in a coherent way. |