

Term Paper Assignment

Write a Survey Paper

CS 3398.251 and CS 3398.252, Spring 2012

Instructor: Jill Seaman

Due: 2/28/2012 (submission details will be announced later)

Assignment: Write a survey paper about a topic in Software Engineering.

Purpose of the Paper: To provide the reader with a view of existing work that is well organized and comprehensive. The paper should explain the main topic or problem and why it is important. It should summarize the various existing approaches, methods, solutions, and/or practices. It should compare and evaluate these approaches and also describe future directions or possible improvements.

Requirements:

- 10-12 pages text (not including Title page or References), double-spaced.
- Font: Times New Roman, 12 point.
- A minimum of 6 sources, at least 2 from scholarly publications or technical journals. You may find articles in books, journals from the library, on-line, or other sources.

Format: Your paper should be structured as follows:

- Title page
- Abstract (a summary of the paper, write this last)
- Intro (explain the problem or topic and its importance, give background)
- Body
 - Present/explain the various approaches
 - Compare the various approaches, possible improvements, future directions
- Conclusion (summarize your conclusions)
- References (see below for formatting)

REMINDER:

- The writing in this survey paper should be in your own words.
- All ideas, paraphrases of other people's words must be correctly attributed in the body of the paper, citing the references.

Criteria:

- Scope, thoroughness (is it complete? too broad? too narrow? current?)
- Logic of the presentation (organization and theme)
- Quality of explanations
- Critical evaluation of approaches (comparison, advantages/disadvantages)
- Evidence of adequate research
- Grammar and clarity, formatting.

Reference Format

Note: Authors must reference the original source of a work, not a secondary source

When you cite material from your sources, you should explicitly mention them in your paper with a [n] mark. n means the nth paper in the reference list you put at the end of the paper.

Chapter in a Book:

[1] Turner, M. J., Martin, H. C., and Leible, R. C., "Further Development and Applications of Stiffness Method," *Matrix Methods of Structural Analysis*, 1st ed., Vol. 1, Wiley, New York, 1963, pp. 6–10.

Journal Article:

[2] Bhutta, B. A., and Lewis, C. H., "Large-Angle-of-Attack Viscous Hypersonic Flows over Complex Lifting Configurations," *Journal of Spacecraft and Rockets*, published online 30 Nov. 1989; Vol. 27, No. 2, 1990, pp. 194–204; also AIAA Paper 89-0269, Jan. 1989. [Note: Month acceptable if number is not available.]

or (if published only electronically and not yet available in a particular journal issue):

[2] Bhutta, B. A., and Lewis, C. H., "Large-Angle-of-Attack Viscous Hypersonic Flows over Complex Lifting Configurations," *Journal of Spacecraft and Rockets*, published online 30 Nov. 1989.

Proceedings/Transactions Articles:

[3] Blottner, F. G., "Prediction of Electron Density in the Boundary Layer of Entry Vehicles with Ablation," *The Entry Plasma Sheath and Its Effects on Space Vehicle Electromagnetic Systems*, NASA SP-252, Vol. 1, Oct. 1970, pp. 219–240.

[4] Wirin, W. B., "Space Debris 1989," *Proceedings of the Thirty-Second Colloquium on the Law of Outer Space*, AIAA, Washington, DC, 1990, pp. 184–196.

Company Report:

[5] Bhutta, B. A., and Lewis, C. H., "PNS Predictions of External/Internal Hypersonic Flows for NASP Propulsion Applications," VRA, Inc., VRA-TR-90-01, Blacksburg, VA, June 1990.

NASA Report:

[6] Miner, E. W., and Lewis, C. H., "Hypersonic Ionizing Air Viscous Shock-Layer Flows over Nonanalytic Blunt Bodies," NASA CR-2550, May 1975.

Meeting Paper:

[7] Bhutta, B. A., and Lewis, C. H., "Aerothermodynamic Performance of 3-D and Bent-Nose RVs under Hypersonic Conditions," AIAA Paper 90-3068, Aug. 1990.

[8] Hobbs, D. E., "Experimental Investigation of Compressor Cascade Wakes," American Society of Mechanical Engineers, Paper 82-GT-299, April 1982.

AIAA Book Series:

[9] Sutton, K., "Air Radiation Revisited," *Thermal Design of Aeroassisted Orbital Transfer Vehicles*, edited by H. F. Nelson, Vol. 96, Progress in Astronautics and Aeronautics, AIAA, New York, 1985, pp. 419–441.

Electronic Media:

[10] von Hippel, T., "Contribution of White Dwarfs to Cluster Masses," *Astronomical Journal* [online], Vol. 114, No. 4, 1998, pp. 1536–1542, <http://www.journals.uchicago.edu/AJ/journal/contents/v115n4.html> [retrieved 13 April 1998].

[11] Richard, J. C., and Fralick, G. C., "Use of Drag Probe in Supersonic Flow," *AIAA Journal on Disc* [CD-ROM], Vol. 1, No. 2, Disc 1, AIAA, Reston, VA, 1996.

[12] Vickers, A., "10–110 mm/hr Hypodermic Gravity Design A," *Rainfall Simulation Database* [online database], <http://www.geog.le.ac.uk/bgrg/lab.html> [retrieved 15 March 1998].

Anonymous Report:

[13] "Equations, Tables, and Charts for Compressible Flow," NACA Rept. 1135, 1953. [Note: Include month if available.]