



HOW TO SUCCEED IN THE STUDENT DESIGN COMPETITION

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Based on an article by Dr. Charles Hurst, Former SDC Chair

Keys To Success

- Get a team together
 - 2 to 4 students, some juniors or seniors
- Start early
 - no downside to finishing early: see sugg. schedule
- Start with two or more approaches to the early design phase
 - don't "fix" on one idea too soon
- Build in adjustments
 - dimensions, lengths, etc. change with environmental conditions and wear



- Test and Test and Test

- find out how your device can fail and fix that

- Reliability

- robustness is critical

- Turn your development device into a finished product

- “clean” lines often translate to “clean” performance

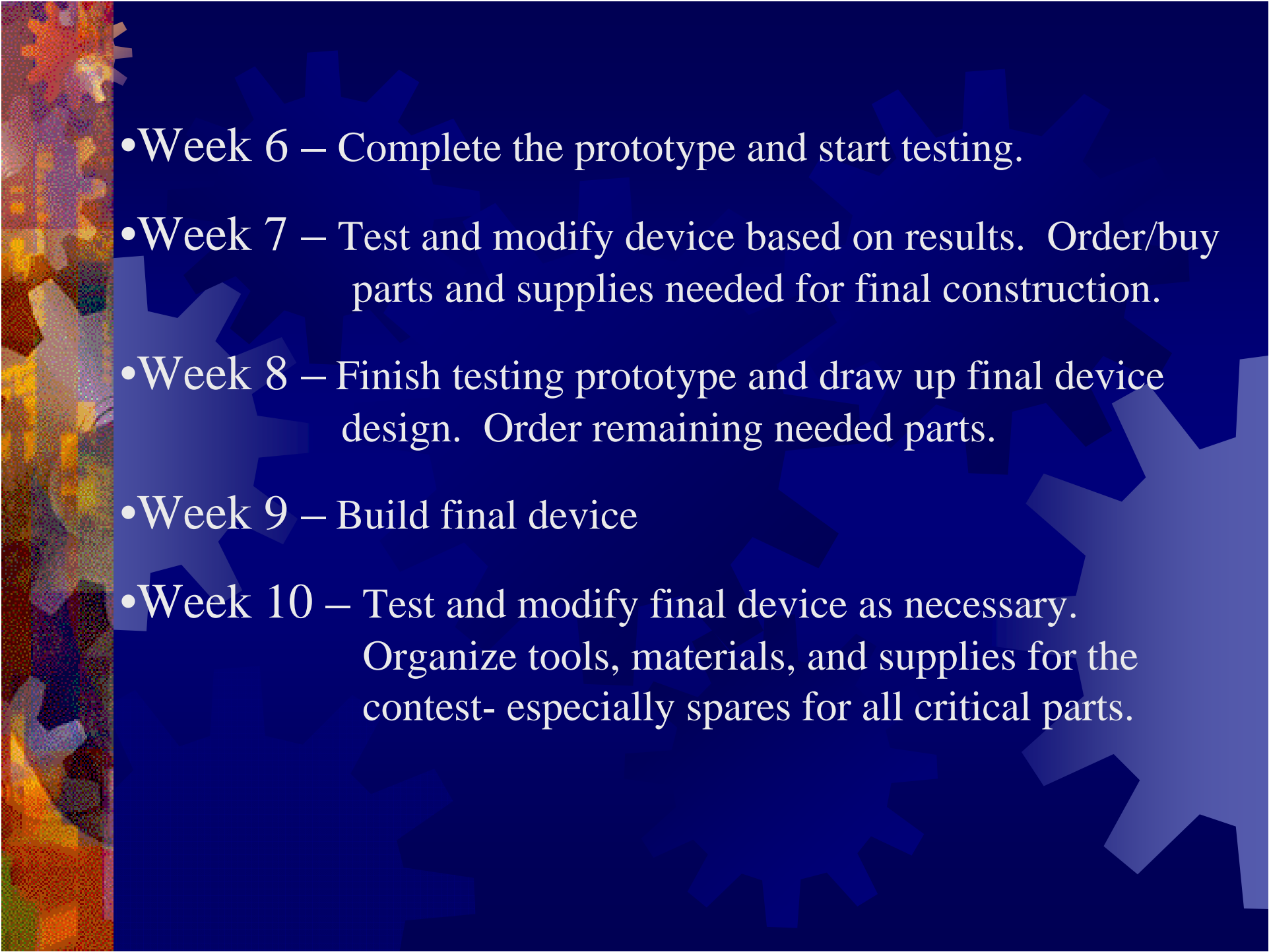
- Make sure you test the finished product

- does it work like the prototype?



Schedule Suggestions

- Week 1 – Find members, form teams, study problem, and Q&A.
- Week 2 – Generate at least 2 approaches to the problem.
- Week 3 – Do simple tests and/or calculate to prove design concepts. Begin the detailed design.
- Week 4 – Complete the design work, parts, and drawings. Order parts and materials.
- Week 5 – Build the prototype.

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- Week 6 – Complete the prototype and start testing.
 - Week 7 – Test and modify device based on results. Order/buy parts and supplies needed for final construction.
 - Week 8 – Finish testing prototype and draw up final device design. Order remaining needed parts.
 - Week 9 – Build final device
 - Week 10 – Test and modify final device as necessary. Organize tools, materials, and supplies for the contest- especially spares for all critical parts.

Questions



Visit the Q&A page to submit your questions to the SDC Committee:
http://www.asme.org/Events/Contests/DesignContest/2009_QA.cfm
...or contact *sdc@asme.org*.