Did I Invent Something?

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Inventors are AWESOME!

- “American Ingenuity”
- Industrial Revolution
- PTO Tourist Attraction
- Inventors Hall of Fame
- National Academy of Inventors
- Biotech, nanotech, IT, cellular, robotics
Ordinary People Like Me?

- Farmers, barbers, housewives, students, store clerks
- Kings and paupers
- Geniuses, fools and crackpots
- Immigrants and travelers
- Unemployed people
- Hobbyists
What Do They Have in Common?

- Frustration or curiosity
- Think they are creative
- Able to ignore barriers
- Question authority of “experts”
- Willing to ACT!
What is an “invention”?

- A composition, article, machine, method, process or improvement
- For which the inventor has formed definite and permanent idea in his or her mind
- And can be described well enough it can be carried out
Things that are NOT Inventions

- A problem to be solved
  - Microwaved pizza gets soggy
- A general product concept
  - Solar powered cellphone
- Ideas that violate laws of physics
  - Perpetual motion machines
- Products of nature
You Know You Made One If:

- You get excited about something
- You find a surprising result
  - Too big, too small, too fast, too slow
- You can’t find what you need, so you make one
- People think what you have is cool
- People think you screwed up
You Know You Made One If:

- You make a diagram
- People don’t believe your results
  - Reviewers, your advisor, you!
- You make a prototype
- Somebody says, “wow, I hope you patented that!”
How to Throw Inventions Away

- “I’m too busy.”
- “Somebody probably already did that before.”
- “I don’t care about money.”
- “I don’t want to bother the TTO.”
- “My advisor won’t like it.”
How to Throw Inventions Away

- “It’s too low-tech.”
- “It’s too hard to explain.”
- “I’m not interested in products.”
- “They’ll laugh at me.”
- “It’s probably not valuable.”
- “There’s already stuff out there.”
How to Throw Inventions Away

- “I’ll just publish it and see what happens.”
  - Publications, funded grant applications, progress reports, posters, presentations DESTROY patentability in foreign countries
  - You have 1 year to apply in the U.S. (Hopefully nobody steals it!)
How to Capture Inventions

- Meet someone from the TTO
- Give a call even if you doubt it
- Send stuff to the TTO
  - manuscripts, grant applications, progress reports, theses
- Invite someone from the TTO to some lab meetings
How to Capture Inventions

- The TTO LOVES disclosures!
- Don’t play patent lawyer
- Ask the TTO about experiments
- Put blank disclosures in the lab
- Appoint an “Invention Guru”
- When in doubt, shout it out!
So What’s Patentable?

“Anything under the sun made by the hands of (wo)man.”

Must be

- “patentable subject matter”
- Novel
- Non-obvious
- Well - described
Patentable Subject Matter

- Composition of matter
- Machine
- Article of Manufacture
- Method or process
- Improvement on any of these
Novelty

- Not previously described in a single publication or patent or otherwise publically disclosed
- More simply, lack of novelty means somebody else invented it first!
Non-Obviousness

- One of ordinary skill in the “Art”
- Solving the same problem at the same time
- Aware of multiple publications, patents and other information
- Would not have been naturally drawn to the idea or solution
“Secondary Factors”

- Long-felt, unmet need
- Skepticism, then accolades
- Commercial success
- Failure of Others
- Copying by others
- “Teaching away”
Practical Considerations

- VERY subjective
- Examiners may
  - find exotic references
  - Use “hindsight”
  - Not know the science
- Examiners must issue patents!
- Usually leads to negotiation
Obvious Things – “Mere Combinations of Old Elements”

- Toothpaste in the handle
- Eraser on a pencil
- Color-coded beer taps
- Solar powered spotlight
Non-Obvious Things?

- The E-Bay “Buy it Now” feature
- Cardboard bicycle
- Apple’s “slide to unlock” bar
- Pillow with an arm hole
- Self-twirling spaghetti fork
- Pizza scissors
- Gum package with a waste compartment
- Remote control with bottle opener
ASSUME it’s Patentable!

- Too easy to talk yourself out of it!
- The TTO sometimes spends HOURS evaluating patentability
- The patentable feature may not be the one you are focused on
- Even the simplest things can be patentable!
“If You Think of Something, Say Something!”

- The TTO is here to help you
- Even if it’s not a UMass invention
- We are technology junkies!
- We get lonely if nobody calls
- We don’t want to miss “the big one”
- We NEVER laugh at inventions
- We are teachers at heart
Make a Disclosure Before you Leave!

- Two sentences about an idea (you must have one somewhere!)
- Your name and contact info
- Leave the rest blank!
- We’ll call or come see you
- Maybe we’ll patent it!
- At least you will know who to call next time. 😊
THANKS!

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