Job Interviews

A.J. Brush, Microsoft
Hillery Hunter, IBM

With thanks to prior speakers
Amanda Stent, Rita H. Wouhaybi
Your Panelist – A.J. Bernheim Brush

Education

Career
- Microsoft,
  - Microsoft Research for 12 years,
  - 2 years in Cortana product
- Year of leave working in Industry as programmer for personal reasons
- Research Areas: HCI, Tech for the Home (Speech Interaction, Ubicomp, IoT)

Family and Fun:
- Kids: Colin(16) and Ryan (13).
- Hobbies: Exercise, Reading, Travel
Where A.J. works

Microsoft Research
• Established in 1991
• More than 850 researchers
• 55 areas of research

MSR is a small part of Microsoft (< 1% of employees)

Cortana product
• Microsoft’s digital assistant
• More people than all of research
• Immediate impact
• Shipping my research
A.J.’s advice

• There is a job that fits you. It can take time to find it and the process will likely be stressful
• If you don’t like your options look for something that doesn’t close doors (A.J. example -> Postdoc during recessions and due to 2 body problem)
• Knowing what you want is really important (and really hard, at least for me 😊). E.g. work environment, intellectual freedom, funding
• Change is always possible, keep learning
Hillery
Pragmatics
What is a YOUR Dream Job?

Figure out:
• Where to live?
• What kind of work?
• What direction and how much to grow?

Get an internship for 2-3 summers
• Sometimes ‘hired’ before graduation

Industry jobs come in many flavors
• Research
• Engineering
• Development
• Design
• Start-up
Applying for Jobs

Less regulated schedule
Your network will matter.
Be known and learning
- Volunteer at local events and conferences
- Go to talks by people from industry (and academia) visiting your school. Meet with them.
- Give polished presentations at conferences
- Target networking opportunities at conferences
- Stay in touch with school alumni

Attend bigger events: GHC, career fairs, CRA-W
Apply to positions on employers website
Phone Interview

It’s a pre-screen

Do your homework

• Look-up the person who contacted you for screen
• Lookup the group/team
• Read the open position (open req) closely for details that you might have missed

Mock/practice phone interviews
On-Site Interview

Logistics

• Give yourself plenty of time to get there, fly the night/day before
• Show up on time (or early)
• Dress professionally
• Be confident but not arrogant

Make sure you understand format

• Talk? Whiteboard interviews? Meetings?
• Ask for the list of people ahead of time, research them.
• Ask for breaks if you need them, take a breath in restroom
• Lunch/dinner are interviews, stay professional
Interview (2)

If there is a talk (same as academic)

• Rehearse, rehearse, rehearse
• Have polished slides: call out important points, use visual material, dig deep technically
• Be polite when answering questions but don’t let them de-rail you
• Don’t be offended if they didn’t have time to read cv/papers closely or attend talk.
• Ask questions: your chance to figure out if you want to work there.
• Is this a place you can see yourself?
Things to consider

There is a ton of variability in industry jobs
Sometimes people don’t understand the value of the Ph.D.
If you are trying to get an engineering job make sure your coding skills are visible in CV and up-to-date
You have learned to deal with ambiguity and find solutions. This is valuable.
Offers

Congratulations

Negotiate whatever you care about.

- Start date
- Salary (even if outside your comfort zone)
- Signing bonus
- Moving package
- Campus and flexibility
- Presenting work at conferences

If anyone asks you about how much you are looking to be paid
“Happy to consider your best offer”
Discussion Questions

• Do internships matter?
• How do I showcase my technical skills?
• Can I publish papers? Contribute to open source projects? Work with students?
• How do I find and get on projects?
• How are projects started?
• What is the interview process like?
• How important is teamwork versus individual work?
• How are my work goals set?
• What is the career path of a researcher in your organization?
• Is it possible to switch during your career: Industry/Academia/National Laboratory/Funding Agency/Non-Profit?
Thank you!
Amanda: Top 3 Pieces of Advice

- Finding jobs:
  - Your professional network and your online presence are everything
    - Make sure they show you are looking

- Interviewing:
  - Use the opportunity to show & tell them why they want you
    - And show you are interested in them

- Once you have an offer:
  - Don’t feel you have to say yes to the initial offer
    - Do tell them if you have other offers/interviews
Rita: “I Wish I Knew”

- Industry does lots of cool stuff, you just (mostly) don’t hear about it (get an internship)
- You can innovate without writing papers: think patents, think impact, think touching people’s lives
- Think of your career as your own startup
- Don’t forget about life, think about cities that you would like to live in
## Industry to Academia

<table>
<thead>
<tr>
<th>Academia</th>
<th>Industry (other than Research)</th>
<th>National Lab or Industrial Research</th>
</tr>
</thead>
<tbody>
<tr>
<td>Active publishing in top tier conferences</td>
<td>Must build “real” systems</td>
<td>Mix of building “real” systems and publishing</td>
</tr>
<tr>
<td>Active collaborations with academia</td>
<td>Up-to-date technical skills</td>
<td>Active collaborations with labs and academia</td>
</tr>
<tr>
<td>Establish visibility in research community</td>
<td>Understand business roadmaps</td>
<td>Address agency or company mission critical problems</td>
</tr>
<tr>
<td>“Soft” money</td>
<td>“Hard” money</td>
<td>“Soft” and “hard” money</td>
</tr>
</tbody>
</table>