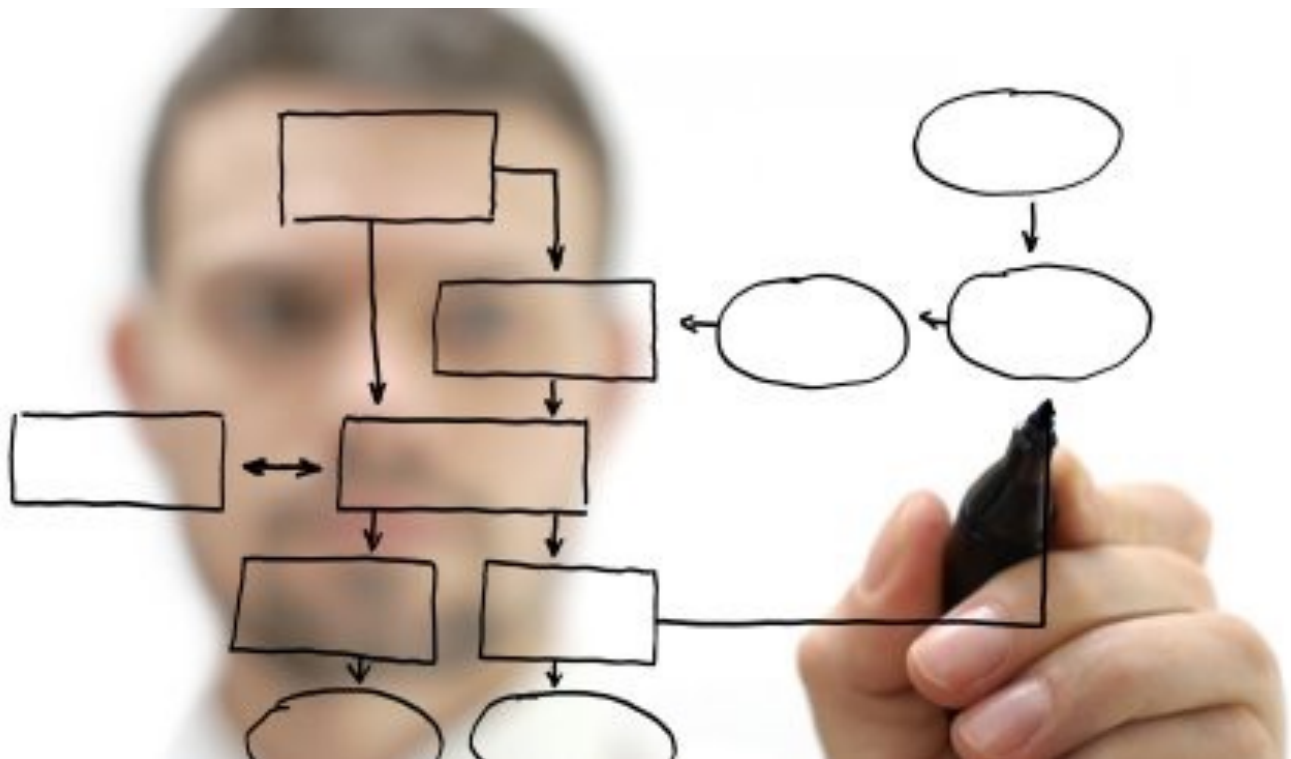


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# A Guide to the Technical Interview Process

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Designed for Notre Dame CSE Students



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# The Technical Interview

The technical interview process can be very intimidating. Thankfully, this guide is here to help you through it! We will go through different ways to go about getting an interview as well as tools to use in preparation for your technical interview.

## Helpful Materials

There are many books available to help you prepare for a technical interview, as well as websites that are designed to do the same. These materials include practice problems that are often used in technical interviews and focus on key concepts to know going into a technical interview.

Some examples include:

- *Cracking the Coding Interview* by Gayle Laakmann McDowell
- *Coding Interview Questions* by Narasimha Karumanchi
- HackerRank videos on YouTube

## Concepts to Study

Technical interview questions tend to focus on a core group of basic computer science topics. These often include:

- Data Structures
  - Arrays
  - Linked Lists

- Trees
- Queues
- Stacks
- Hash tables
- Sorting Algorithms
  - Bubble Sort
  - Insertion Sort
  - Selection Sort
  - Quick Sort
  - Merge Sort
- Searching Algorithms
  - Depth First Search
  - Breadth First Search
  - Binary Search

Knowing these concepts and the time complexities of their implementations is important in preparing for a technical interview. Often, questions asked in technical interviews can be solved using these concepts and algorithms.

# The Notre Dame Career Center

The Notre Dame Career Center is a great resource on campus to get connected with possible interview, internship, and job opportunities. The services provided by the Career Center that are useful in the interview process include resume reviews, Career Fair Prep workshops, mock interviews, and opportunities to connect with alumni.

## *The Career Fair*

The Career Fair is a great way to network with companies and meet alumni who work in the tech industry. Often, recruiters at the Career Fair offer interviews on the spot, so it is a great way to find interview opportunities.

# Resume Tips

When preparing your resume, several sections to include are:

- Technical Experience
  - List the languages you have learned in classes so far
  - Mention any side projects that you have worked on
- Notable Achievements
  - Any honors or awards that you have received should be listed on your resume. Examples of this could be Dean's List recognition, research grants, etc.
- Work Experience
  - Include both technical (internships, etc.) and non-technical (campus job, etc.) work experience on your resume

Often in interviews, the skills listed on your resume will be mentioned. Be able to back up everything listed on your resume during the interview, and never exaggerate skills or experience.