Problem : Ingin mencari buku dengan serial number 60 di dalam sebuah perpustakaan. Seluruh isi perpustakaan sudah disusun sesuai alfabet dan diberi serial numbernya. Total buku yang ada di perpustakaan sebanyak 520 buku.

Approach 1 O(n)

1. Go to books catalog (520 books)

2. Go to the first book

3. Look at the serial number

4. If the serial number is 60

5. Pick the book

6. Else if the serial number is not 60

7. Go to the next book

8. Go to line 3

9. Else

10. End

Approach 2 O()

1. Go to books catalog (520 books)

2. Go to the second book

3. Look at the serial number

4. If the serial number is 60

5. Pick the book

6. Else if the serial number is not 60

7. Go to the next two books

8. Go to line 3

9. Else

10. End

Approach 3 O()

1. Go to books catalog (520 total books)

2. Go to middle of the books catalog

3. Look at serial number

4. If the serial number is 60

5. Pick the book

6. Else if the serial is bigger than 60

7. Go to middle of the left side of the half

8. Go back to line 3

9. Else if the serial is smaller than 60

10. Go to middle of the right side of the half

11. Go back to line 3

12. Else

13. End

