

الطبعة
الثانية

SBE2h

THE
GUIDE
BOOK

First Year
Second Term

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Mathematics
Linear algebra
& Integration

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physics**

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Introduction

Don't skip !!!

Welcome to another version of **THE GUIDE BOOK**, Hope that it helped you in the first term even a little bit.

I won't take too long, just clarify couple of things that may not be obvious to you :

I. First : 2nd term wasn't that much of intersting and some courses didn't have that sagnificant objective.

II. Second : you may wonder why this vesion is in english, I thought as all courses are in englsih it'd be easiser to expalin the concepts.

Let's move on



01

Mathematics

Linear algebra & Multiple Integration



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LA Part:

- you may find the first **2 lectures** a little confusing but they are extremely important for the rest of the course so understand them clearly (blash bsmga mn 2wlha).
- as you move on, the **concepts** of the course will become a bit complicated, don't worry we all passed that phase just study the concepts and solve the sheets "on your own" don't entirely depend on the sections.
- it is a must to study from Dr. Lucy's **slides**, she focuses on some concepts that found only in the slides.

LA Part:

- so which videos that might help you:
 - 1- **Dr. Lucy's videos** on the drive “recommended on the first 2 lectures”
 - 2- **EECE 2024 playlist** “skip to the concept of vector space & subspace, it'll identify it so easy”
 - 3- **Eng. Hesham Sections** “a must , he explains concepts clearly and solve some questions from the sheets ”
- Just solve the sheets carefully and I assure you'll get great marks & trust me this may be the only course that will satisfy you as you dig deeper.

Integration Part:

- if you're not that good at integration, don't worry just study the **lectures** and solve the **sheets** and you will be on the safe side.
- Dr. Ahmed is fast sometimes but if you stop him and ask him he will try to explain to you as possible, so if his explanation goes well with you, you probably wouldn't need any other sources for the course topics, maybe some animation videos to imagine well what's going on.
- try to attend the **sections** when the doctor solve the sheets this will help you further .



DOT PRODUCT & PROJECTION

Dr. Lucy's videos

VECTOR SPACE AND SUBSPACE
EECE 2024



ALL SECTIONS

Eng. Hesham I ... Eng. Hesham II



SHEETS SOLUTION

Eng. Moheb

INTEGRATION

Kimcam academy ...

Houston Math Prep ...

Dr. Mohamed Ibrahim

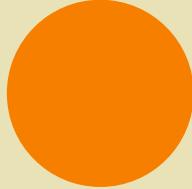
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Medical physics

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Technical & concepts

- This course took most of our time as we had many **tasks** & projects beside the heavy content, it's an example of "never judge a book by its cover".
- The first part (**sound waves**) is the easy part so you may be manipulated by the cover, the 2nd part (**light waves**) is much denser so don't neglect it.
- It depends mainly on memorizing the content and understand some concepts **accumulated** on each other, the **problems** is the easy part just memorize the rules and see the sections "don't forget sheets".
- Try to attend the lectures on campus as it is more interesting and understandable than online recorded lectures.

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Bio signals

Uses are...

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The undefined course

- the first **3-4 lectures** depends mainly on math of first term (Laplace & convolution), the second part you may have an idea about it (Fourier transform) but it's much deeper and superficial at the same time.
- there is no external source for the **last 3 lectures**, you have to watch Doc's videos (The doc's explanation was hard to understand most of the times so I prefer it be the last thing to do).
- the **reference** is your only friend, you must solve the problems after each chapter as it comes typical in the midterm & final.
- if you want to understand the **concepts**, may god be with you (basmga mode on)



Definitions are...

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Circuits 2

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AC Circuits part

- the **first 2 chapters** are just an extension of the first term but instead of dealing with real values it's complex values.
- the **next 2 chapters** are new but not that hard if you memorize the rules well.
- you need to practice a lot and solve many **problems** as a tiny sign will destroy all the problem, the sheets are also important.
- it's the same **reference** as first term so you can depend on it beside the slides.

Magnetism part

- you should study this part **on time** without any delay or you will regret later as there is **65 mark** on it.
- study the **lectures** carefully and don't just focus on the problems there's also concept questions in the final.
- the **sheets** are extremely important but sections weren't that clear
(the TA sometimes solve some problems wrong in the 21 recorded sec)
- Don't hesitate to ask him if you don't understand anything.
- **solve previous exams** , many questions come from it.



CIRCUITS 2

Eng. Karim --- SBME 24



TRANSFORMERS

Abdallah Reda



INDUCTION MOTORS

Kariman Zaza



Comparison are...



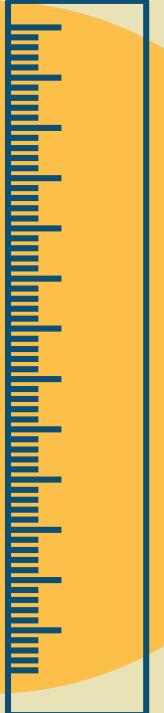
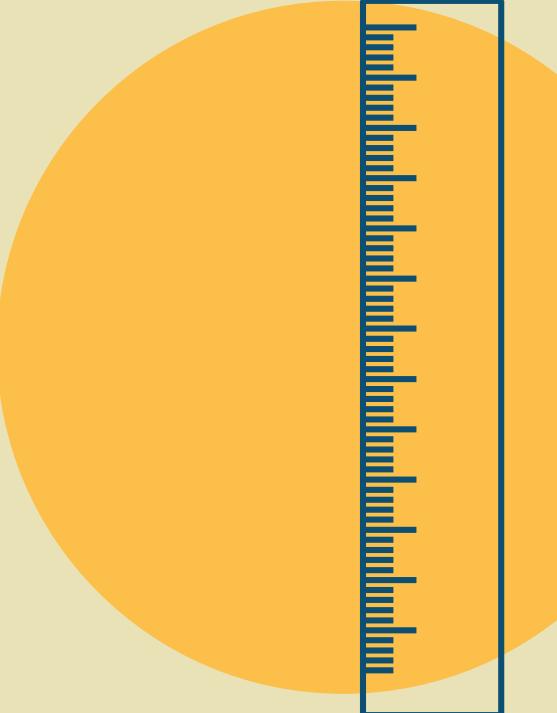
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Chemistry

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- there's no much effort needed to achieve high marks.
- Dr. Elshimi was really helpful and the **topics** weren't that much hard specially the second part, was close the high school chemistry
- the first part needs little bit concentration in my opinion.
- Solve the **sheets & T.H.E** and that's it.

الكيميا سيب نفسك والبابا هيديك الامتياز ❤️❤️❤️



Consequences are...

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Programming

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Pseudocode course

- All we had was **basics** of programming principles so we didn't take the **OOP** part.
- Most of the exam's question are from the **reference** on the drive.
- I just hope your luck is better than us.

Thanks

”قُلْ هَلْ يَسْتَوِي الَّذِينَ يَعْلَمُونَ وَالَّذِينَ لَا يَعْلَمُونَ إِنَّمَا يَتَذَكَّرُ أُولُو الْأَلْبَابِ“

Credits: Mohamed El-Sayed
Nouran Khattab “[link](#)”
Omar Nabil
Ziyad EL-Fayoumy

Design: Mohamed El-sayed