

Da... > My courses > CO... > General > LAB Discussion Forum > [Lab5]BLE hopping algorithm hint

Engineering Information Block

Support Services For Students

Student Responsibilities and Conduct

TELT ADMIN DO NOT DELETE THIS BLOCK

Settings

Forum administration

Optional subscription

Subscribe to this forum

Subscribe to this discussion

Don't track unread posts

Course administration

Navigation

Dashboard

Site home

Site pages

My courses

Sexual Misconduct Module

FD - PHYS1121-PHYS1131-

PHYS1141-5193_00283

IT For Engineering

COMP4336-COMP9336-

5226_00530

Participants

Competencies

Grades

General

Access to your Lecture

Recordings

Welcome video from the

lecturer

Notices and

Announcements from Course

Authority

Forum for General

Discussion

LAB Discussion Forum

[Lab5]BLE hopping

algorithm hint

...ors/suggestions for

textbook pre-print chapters.

...ere to attend lectures

on-line 10-am-1pm Fridays)

Course Outline for 2022

Term 2

Getting started - Course

Outline (VERY IMPORTANT)

...edu.au], Jiawei (Gary) Hu

[jiawei.hu@unsw.edu.au]

Individual Term Project

Week 1 Lecture [03 JUN]:

Wireless Fundamentals I

Week 2 Lecture [10 JUNE]:

Wireless Fundamentals II

... basics + Mainstream WiFi

(802.11a/b/g/n/ac/ax/be)

...ecture [24 June]: Niche WiFi

(802.11af/ah/ad/ay)

Week 5 Lecture [01 July]:

Bluetooth

Week 6 (05 July): NO

Lecture/Quiz/Lab

Digital Assessment (Inspira)

Resources for Students

COMP3141-5226_00165

SENG3011-5223_00891

COMP2111-5223_00559

COMP3411-COMP9814-

5223_00183

SENG2011-5219_00788

COMP3311-5219_00177

More...

LAB Discussion Forum

[Lab5]BLE hopping algorithm hint

Mac "lists all the visible APs individually" command not working in the terminal

Display replies in nested form

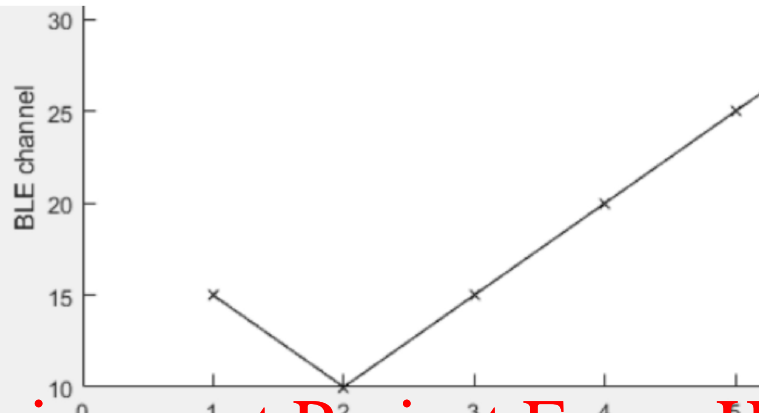
[Lab5]BLE hopping algorithm hint

Picture of Jiawei Hu

by Jiawei Hu

Hi All,

When you using MATLAB simulator and select some "bad channels". You might observe something like below:



In here, the hopping increment is 5 and bad channels are 0-9. If the algorithm choose channel 15, and even it choose channel 10 and then it choose channel 15 again in the event. Why the algorithm choose in this way?

Answer:

In the first event, the unmapped channel is $(0+5) \bmod 37 = 5$ which is a **bad channel**. Therefore, it uses **remapping algorithm** to remap it to good **channel 15**. (You need to understand how channel remapping algorithm works here, which is also requested in Lab5 task2)

In the second event, the next unmapped channel is $(5+5) \bmod 37 = 10$ which is a **good channel**, so it is selected.

Similarly, in the third event, the next unmapped channel is $(10+5) \bmod 37 = 15$ which is a **good channel**.

Permalink Reply

Re: [Lab5]BLE hopping algorithm hint

Picture of Krishna Srivastava

by Krishna Srivastava

Thank you Gary, the above makes way more sense now,

Cheers,

Krishna

Permalink Show parent Reply

Re: [Lab5]BLE hopping algorithm hint

Picture of Jiawei Hu

by Jiawei Hu

No worry, Krishna.

You will need to look at task 2 (when it is a bad channel) again. Sorry about the confusion from yesterday.

Permalink Show parent Reply

Mac "lists all the visible APs individually" command not working in the terminal

Turn Theatre Display On

My Moodle

Academic Integrity | Privacy | Content & Social Media Disclaimer | Copyright & Disclaimer | Accessibility | Site Map

You are logged in as Dongfei Fan (Log out)