

# **Measuring the presence of magnetic fields in the circumgalactic medium and around HVCs using the POSSUM survey**

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Research School of Astronomy and Astrophysics

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Except where otherwise indicated, this thesis is my own original work.

Olivia Walters  
16 February 2024

to my xxx, yyy (yyy is the people you want to dedicated this thesis to.)

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# Acknowledgments

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Who do you want to thank?

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# Abstract

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# Introduction

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## 1.1 Thesis Statement

I believe A is better than B.

## 1.2 Introduction

Put your introduction here. You could use `\fix{ABCDEFG.}` to leave your comments, see the box at the left side.

You have to rewrite your thesis!!!

## 1.3 Thesis Outline

How many chapters you have? You may have Chapter 2, Chapter 3, Chapter 4, Chapter 5, and Chapter 6.

# Background and Related Work

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At the begging of each chapter, please introduce the motivation and high-level picture of the chapter. You also have to introduce sections in the chapter.

Section 2.1 xxxx.

Section 2.2 yyyy.

## 2.1 Motivation

## 2.2 Related work

You may reference other papers. For example: Generational garbage collection [Lieberman and Hewitt, 1983; Moon, 1984; Ungar, 1984] is perhaps the single most important advance in garbage collection since the first collectors were developed in the early 1960s. (doi: "doi" should just be the doi part, not the full URL, and it will be made to link to dx.doi.org and resolve. shortname: gives an optional short name for a conference like PLDI '08.)

## 2.3 Summary

Summary what you discussed in this chapter, and mention the story in next chapter. Readers should roughly understand what your thesis takes about by only reading words at the beginning and the end (Summary) of each chapter.

---

# Design and Implementation

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Same as the last chapter, introduce the motivation and the high-level picture to readers, and introduce the sections in this chapter.

## 3.1 Smart Design

## 3.2 Summary

Same as the last chapter, summary what you discussed in this chapter and be the bridge to next chapter.

---

# Experimental Methodology

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## 4.1 Software platform

## 4.2 Hardware platform

Table 4.1 shows how to include tables and Figure 4.1 shows how to include codes.

Architecture	Pentium 4	Atom D510	i7-2600
<b>Model</b>	P4D 820	Atom D510	Core i7-2600
<b>Technology</b>	90nm	45nm	32nm
<b>Clock</b>	2.8GHz	1.66GHz	3.4GHz
<b>Cores <math>\times</math> SMT</b>	$2 \times 2$	$2 \times 2$	$4 \times 2$
<b>L2 Cache</b>	1MB $\times$ 2	512KB $\times$ 2	256KB $\times$ 4
<b>L3 Cache</b>	none	none	8MB
<b>Memory</b>	1GB DDR2-400	2GB DDR2-800	4GB DDR3-1066

Table 4.1: Processors used in our evaluation.

```
1 int main(void)
2 {
3     printf("Hello_World\n");
4     return 0;
5 }
```

(a)

```
1 void main(String[] args)
2 {
3     System.out.println("Hello_World");
4 }
```

(b)

Figure 4.1: Hello world in Java and C.

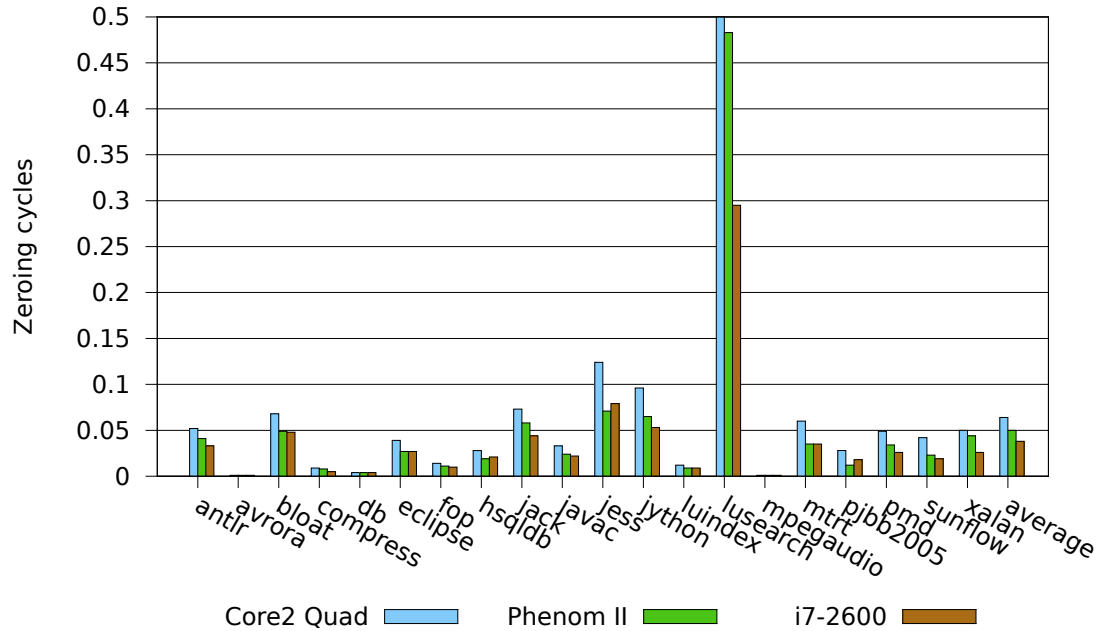
# Results

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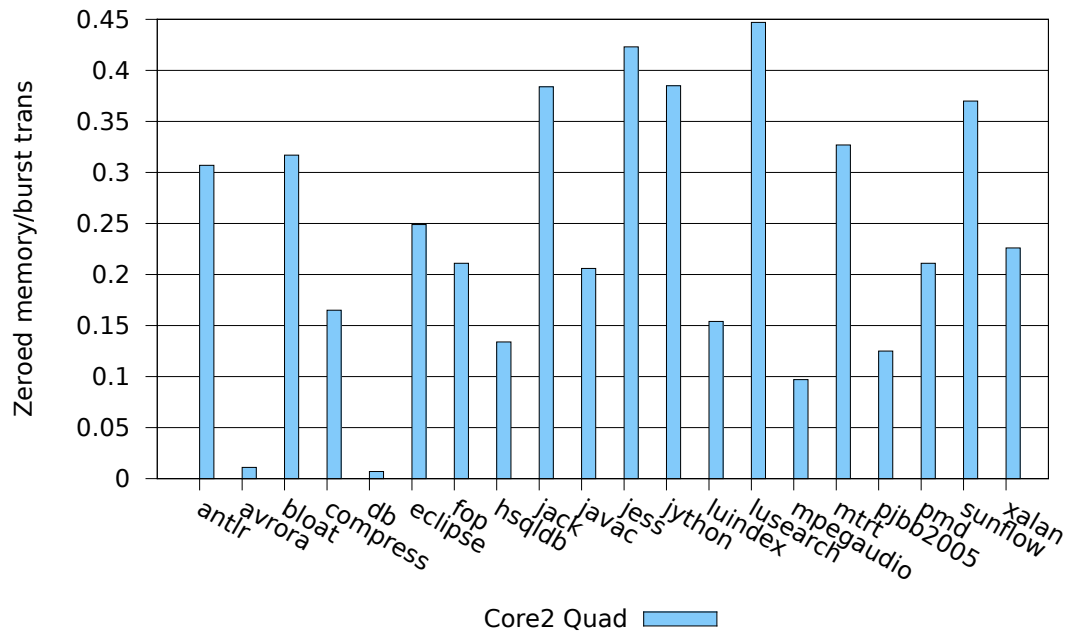
## 5.1 Direct Cost

Here is the example to show how to include a figure. Figure 5.1 includes two subfigures (Figure 5.1(a), and Figure 5.1(b));

## 5.2 Summary



(a) Fraction of cycles spent on zeroing



(b) BytesZeroed / BytesBurstTransactionsTransferred

Figure 5.1: The cost of zero initialization



# Conclusion

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Summary your thesis and discuss what you are going to do in the future in Section 6.1.

## 6.1 Future Work

Good luck.

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