

02207 : Advanced Digital Design Techniques

Low-pass Filter (2 x 1-D)

Examination Project

Group *dt07*

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December 9, 2007

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1 Introduction

The project that we have implemented is a 2D filter of size 3x3 for convolution of an image of size 256x256 pixels.

2 Design Architecture

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3.1 Memory Initialization

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3.3 Memory Access Sequence

4 Finite State Machines

4.1 Input Controller

4.2 Output Controller

5 Synthesis

6 Results

7 Discussion