

## Loops analysis

```

393 // partially unrolled loop
394 #pragma unroll
395 for (int df1=0; df1<SURF_UNROLL; df1++)
396 {
397     ...

```

## Unrolled loops

	Pipelined	II	Bottleneck	Details
maxwellsurfacekernel.B6 (midg2_fpga.cl:380)	Yes	~1	n/a	II is an approximation.
1X Fully unrolled loop (midg2_fpga.cl:391)	n/a	n/a	n/a	Loop has trip count of 1
Fully unrolled loop (midg2_fpga.cl:395)	n/a	n/a	n/a	Unrolled by #pragma unroll
Fully unrolled loop (midg2_fpga.cl:416)	n/a	n/a	n/a	Unrolled by #pragma unroll
maxwellvolumekernel.B7 (midg2_fpga.cl:165)	Yes	~1	n/a	II is an approximation.
1X Fully unrolled loop (midg2_fpga.cl:181)	n/a	n/a	n/a	Loop has trip count of 1
Fully unrolled loop (midg2_fpga.cl:185)	n/a	n/a	n/a	Unrolled by #pragma unroll
Fully unrolled loop (midg2_fpga.cl:221)	n/a	n/a	n/a	Unrolled by #pragma unroll

```

183 // partially unrolled loop
184 #pragma unroll
185 for (int dm=0; dm<VOL_UNROLL; dm++){
186     float4 D;// = read_channel_altera(ch_vol_drdsdt);
187     D.x = 1_Dr[(n*p_Np/VOL_UNROLL)+m][dm];

```