Weekly Report: Mar. 08 – Mar. 14

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Weekly Report

- ▶ Matrix-vector streaming unit complete
- ▶ Tested the mvau_stream.sv using mvau_stream_tb.sv
- ▶ Testbench performs testing by:
  - ▶ Generating random data from input activation and weight streams
  - ▶ Input activation stream $\rightarrow$ SIMD$\times$TSrcI
  - ▶ Weight stream (tile) $\rightarrow$ PE$\times$SIMD
  - ▶ Total testing done for:
    - ▶ Weight matrix size $\rightarrow$ MatrixH$\times$MatrixW
    - ▶ Input activation matrix size $\rightarrow$ (KDim^2*IFMCh) $\times$ OFMDim^2, defined as parameters ACT_MatrixH and ACT_MatrixW
- ▶ Control block of batch and streaming units separated
- ▶ READMEs updated to reflect the changes and on how to run tests
- ▶ Weight memories implemented for MVAU Batch but not tested
- ▶ Testing to be performed using data generated by the swg_tb.cpp