

AdAM: Adaptive Approximate Multiplier for Fault Tolerance in DNN Accelerators

Taheri, Mahdi; Cherezova, Natalia; Nazari, Samira; Azarpeyvand, Ali; Ghasempouri, Tara; Daneshtalab, Masoud; Raik, Jaan; Jenihhin, Maksim IEEE transactions on device and materials reliability 2024 / p. 66-75 : ill <https://doi.org/10.1109/TDMR.2024.3523386>

AdAM: adaptive fault-tolerant approximate multiplier for edge DNN accelerators

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APPRAISER : DNN fault resilience analysis employing approximation errors

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Area efficient hexadecimal divider circuit implementation based on USP-awadhoot division algorithm

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DeepAxe : a framework for exploration of approximation and reliability trade-offs in DNN accelerators

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Heterogeneous Approximation of DNN HW Accelerators based on Channels Vulnerability

Cherezova, Natalia; Pappalardo, Salvatore; Taheri, Mahdi; Ahmadilivani, Mohammad Hasan; Deveautour, Bastien; Bosio, Alberto; Raik, Jaan; Jenihhin, Maksim 2024 IFIP/IEEE 32nd International Conference on Very Large Scale Integration (VLSI-SoC) 2024 / 4 p. : ill <https://doi.org/10.1109/VLSI-SoC62099.2024.10767798> [Conference proceedings at Scopus](#) [Article at Scopus](#)

Special session : approximation and fault resiliency of DNN accelerators

Ahmadilivani, Mohammad Hasan; Barbareschi, Mario; Barone, Salvatore; Bosio, Alberto; Daneshtalab, Masoud; Torca, Salvatore Della; Gavarini, Gabriele; Jenihhin, Maksim; Raik, Jaan; Taheri, Mahdi 2023 IEEE 41st VLSI Test Symposium (VTS) : proceedings 2023 / 10 p. : ill <https://doi.org/10.1109/VTS56346.2023.10140043> [Conference proceeding at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

Special session: reliability assessment recipes for DNN accelerators

Ahmadilivani, Mohammad Hasan; Bosio, Alberto; Deveautour, Bastien; Dos Santos, Fernando Fernandes; Guerrero-Balaguera, Juan-David; Jenihhin, Maksim; Kritikakou, Angeliki; Sierra, Robert Limas; Raik, Jaan; Taheri, Mahdi 42nd IEEE VLSI Test Symposium, VTS 2024 2024 / 11 p. : ill <https://doi.org/10.1109/VTS60656.2024.10538707> [Conference proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

Study of estimation based functional iteration approximation dividers

Patankar, Udayan Sunil; Flores, Miguel E.; Koel, Ants ICCE-2021 IEEE International Conference on Consumer Electronics, CES 2021 / p. 1-4 <https://doi.org/10.1109/ICCE50685.2021.9427657> [Conference Proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)