



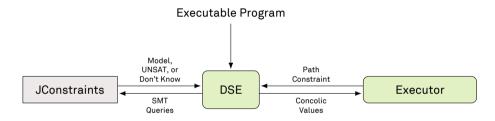


GDart-LLVM: Expanding GDart from the Java Virtual Machine to LLVM Bitcode





GDart: Modular Dynamic Symbolic Execution



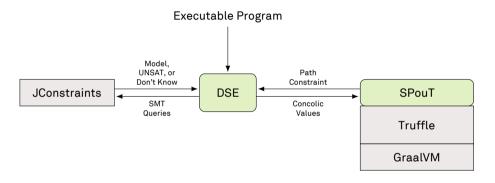
Mues et al.: "SPouT"







GDart: Modular Dynamic Symbolic Execution



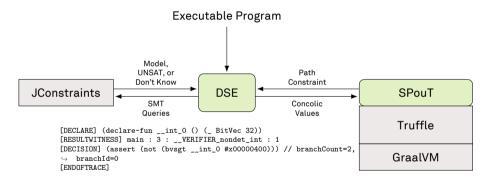
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GDart: Modular Dynamic Symbolic Execution

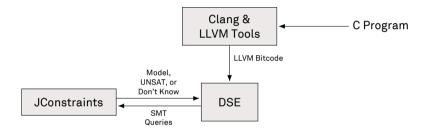


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GDart-LLVM: Reuse of Modules

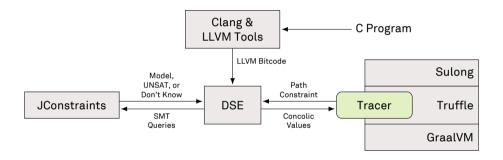


Kemming: "Ein Truffle-Instrument zur dynamischen symbolischen Analyse von LLVM IR Bitcode in der GraalVM"





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Results and Conclusions

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Results and Conclusions

- ReachSafety/BitVectors: 20 correct, 29 no verdict
- Reuse of most components achieved
- Application to more languages:
 - LLVM-compiled: trivial
 - Truffle implementation: implement observer
 - Else: custom executor required





Code: https://aqua.tools