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From benchmarking optimization heuristics to dynamic algorithm configuration

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Acronyms

AOCC Area Over the Convergence Curve
AOC Area Over the (ECDF) Curve
AUC Area Under the (ECDF) Curve
BBOB Black-Box Optimization Benchmarking
CMA-ES Covariance-Matrix Adaptation Evolution Strategy
COCO COmparing Continuous Optimizers
DE Differential Evolution
DynAS Dynamic Algorithm Selection
ECDF Empirical Cumulative Distribution Function
ERT Expected Running time
ELA Exploratory Landscape Analysis
IOH Iterative Optimization Heuristic
KS Kolmogovor-Smirnov
MA-BBOB Many-Affine BBOB
MIP-EGO Mixed-Integer Parallell Efficient Global Optimization
PAR Penalized Average Running time
PCA Principal Component Analysis
SB Structural Bias
SMAC Sequential Model-based Algorithm Configuration
TSNE T-distributed Stochastic Neighbor Embedding
UMAP Uniform Manifold Approximation Projection
VBS Virtual Best Solver