A Complete Bibliography of Publications in the *SIAM Journal on Mathematics of Data Science*

Nelson H. F. Beebe
University of Utah
Department of Mathematics, 110 LCB
155 S 1400 E RM 233
Salt Lake City, UT 84112-0090
USA

Tel: +1 801 581 5254

E-mail: `beebe@math.utah.edu`, `beebe@acm.org`,
`beebe@computer.org` (Internet)
WWW URL: `https://www.math.utah.edu/~beebe/`

17 October 2025
Version 1.11

Title word cross-reference

$2r$ [BNZ21]. 3 [BKSU22]. β [HLG25]. ℓ_0 [DHP22]. k [SGN22, Tri19]. $O(k)$ [LLP+25]. Q [CCM23, Rii23]. t [LS19].

-Connectivity [Rii23]. **-Equivariant** [LLP+25]. **-Learning** [CCM23]. **-NMF** [HLG25]. **-NN** [Tri19]. **-SNE** [LS19]. **-Variance** [SGN22].

1-Periodic [Kur25]. **19** [HNP22].

ABBA [NPVB24]. **Absence** [PB24]. **Abundance** [WT22]. **Accelerated** [BBG20, CC22, DL22, LLP23]. **Accuracy** [BAKS24]. **Accuracy-Robustness** [BAKS24]. **Activation** [CP20]. **Activations** [DH25, MT24, Ver20]. **Active** [CZD+20, MC23]. **Actor** [CHS24]. **Actor-Critic** [CHS24]. **Actually** [Bud25]. **Acyclic** [LLM22]. **Adapted** [GO25]. **Adaptive** [BAKS24, FMS25, HS22, LLRS23, Suk25]. **Adaptively** [SMRE25]. **Adaptivity** [HLRJ22]. **Adjoint** [PBK25]. **Admissibility** [BNS21]. **ADMM** [RSC+22]. **Adversarial** [BGS23, FWDJ23, GNZ23, HS25, JNR25, JC23, LKA+21, LJWH24, MS23, WYSO20]. **Affine** [KL24]. **Aggregated** [BSV21]. **Aggregation** [MV22]. **Agony** [HET23]. **Algebraic** [BM20]. **Algorithm** [ANY19, AT25, AGL21, CCNP23, FP23, ZZST21, ZLZ24, ZN22]. **Algorithmic** [JCD23, LWL20]. **Algorithms** [AG21, ABR19, BGS23, CL25, CDH+21,

GPWS21, GBP+24, GCPT20, GH21, JB22, LLRS23, LST19, MWW22, MSK20, MOPS20, PBGP24, VGWS19, XSC22]. **Alignment** [BE24, HRS25, LMR+20, PWB+19, RBO21]. **Almost** [NKK25]. **along** [LL24b]. **Alphabets** [BM22]. **Alternating** [LS23, LZFZ25, YWTT25]. **Analysis** [ANY19, AFZ25, Bac24, BBH23, BGJ20, BH22, CHS24, CE25, CMS20, CDH+21, CZD+20, DR24, DJRW20, GGWX21, HM21, HNP22, HLZ20, KPR+21, MGHV21, MM23, OWXZ21, Rii23]. **Analytic** [DMOS25]. **Anomalies** [HNP22]. **AO** [RSC+22]. **AO-ADMM** [RSC+22]. **Application** [FP23, HLG25, ML19, MDS25, SMRE25]. **Applications** [BBH23, CDH+21, DH20, Fab25, HFL+22, KTM20, MS24, NN24, Rii23]. **Applied** [CC22]. **Approach** [BSV22, DMOS25, HLZ22, RSC+22, WIM25]. **Approximate** [Atc21, BK23, TCSV24]. **Approximately** [UT19]. **Approximating** [GNZ23]. **Approximation** [AC20, AD21, AdE22, BGJ20, BGKP19, Bud25, CLM+22, CL25, DMR21, Fab25, GIK24, HS25, HG24, JS21, LLP23, LM25, NGBU23, PBK25, PS21, SGL+20, WCPL24]. **Approximations** [ABC19, BLO25, SM25]. **Archetypal** [OWXZ21]. **Architecture** [DH25]. **Architectures** [PU25]. **Area** [GPWS21, JTT+25]. **Argument** [TM20]. **armed** [SRR21]. **Arrangements** [BV19]. **Artificial** [BGJ20]. **Assess** [WWZM20]. **Assumptions** [CDS25]. **Asymmetric** [JCD23]. **Asymptotic** [HLZ20]. **Asymptotics** [LPJ+24]. **Attack** [DHP22, HS25]. **Attacks** [CZD+20]. **Attention** [AFZ25]. **Autodifferentiable** [CSAW22]. **Automatic** [HLZ22]. **Averaged** [CP20, MMZdO24]. **Avoid** [SM20].

Backtracking [MOPS20]. **Balance** [TL24]. **Balancing** [LMM22]. **Banach** [BBT25]. **Bandits** [SRR21, Suk25, Zha22]. **Barron** [LM25]. **Barycenter** [CC22, HMZ22]. **Barycenters** [ABA22, FP23, MMZdO24]. **Based** [AG21, BFM+21, HMR+25, HFL+22, HGL24, HG24, LMR+20, LGL25, MRS20, MC23, Tri19]. **Bayesian** [CJLS25, HLZ22, MNO20]. **Belief** [WWZM20]. **Benders** [DLF25]. **Benefit** [XSC22]. **Benign** [WT22]. **Best** [Fab25]. **Between** [GB23, AD21, DB22, KMDM24]. **Beyond** [LGL25, WYSO20, SM25]. **Bi** [HHvT22]. **Bi-Invariant** [HHvT22]. **Bias** [SRR21]. **Biased** [POW25]. **Big** [Bud25, UT19]. **Bilevel** [SMRE25]. **Binary** [KT21, WT22]. **Biological** [CDH+21]. **Biwhitening** [LZK22]. **Black** [BGJ20]. **Blind** [CR22, SST20]. **Block** [HPG+22, HLG25, PHLP19, SST20]. **Bootstrap** [ZG21]. **Bounds** [AdE22, ERK+19, LJWH24, MKL25, MD19, PPPS24, WTD+21]. **Bregman** [CC22, HPG+22, MOPS20]. **Bridges** [PNW25]. **Bundle** [ZG21]. **Butterfly** [ZRG23].

CA [GO25]. **CA-PCA** [GO25]. **Can** [DLB24, MLGK25]. **Capacity** [MT24, Ver20]. **Case** [CMR+21, DLB24, HNP22, KT21]. **Categorical** [BH22, TLFS21]. **Causal** [CDS23]. **Causality** [TLFS21]. **Centerpoints** [DH20]. **Central** [LL24b, YXKH25, dBSLNW23]. **Centralities** [Ben19]. **Centrality** [CDM25, TCTER21]. **Certain** [Bud25]. **Certificates** [CP20]. **Chain** [Atc21]. **Chains** [BFM+21, GCPT20]. **Change** [YPWR24]. **Characteristic** [GPWS21]. **Circular** [AGL21, CCNP23]. **Class** [CJLS25]. **Classification** [DHP22, GPWS21, WT22]. **Classifiers** [BAKS24]. **Client** [ZBLR24]. **Client-Variance** [ZBLR24]. **Cliques** [GJX25]. **Closing** [LPH+23]. **Clouds**

[Tri19]. **Cluster** [ACQ23, BRZ22]. **Clustered** [SGN22]. **Clustering** [AFZ25, BDS21, CS19, CEH23, DM22, LM20, LS19, VGWS19]. **Coding** [ASE19, LR19]. **Coefficients** [FT20]. **Cohomology** [CW20]. **Collision** [NN24]. **Combinations** [JB22]. **Combined** [ZYWL20]. **Common** [DLB24]. **Communication** [CBD21, LLC22]. **Communication-Efficient** [CBD21, LLC22]. **Communications** [GIMA21]. **Communities** [ZLZ20]. **Community** [FKZ22, WWZM20]. **Compact** [HLZ22]. **Comparisons** [LST19]. **Complete** [CG19, Kur25, LZFZ25]. **Completion** [HZ21, OPAB$^+$21, TTV19]. **Complex** [CLM$^+$22, CDM25, TL24]. **Complex-Valued** [CLM$^+$22]. **Complexity** [ACU23, BE24, BH22, DMSV25, GGWX21, PWB$^+$19, RBO21]. **Component** [CMS20, KT21]. **Components** [KCR25, SBCG$^+$19]. **Composite** [SBCG$^+$19]. **Compressed** [BBH23, ZBLR24]. **Compressive** [LM20, ML19]. **Computation** [HMZ22, LLC22, LMXZ22]. **Computation-Optimal** [LLC22]. **Computational** [LST19]. **Compute** [ABA22]. **Computing** [MMZdO24]. **Concave** [AT25, KCR25, MOPS20]. **Conditional** [KSS20]. **Conditioned** [BNZ21]. **Conditions** [JC23, LBD25]. **Connected** [BGKP19]. **Connection** [DR24]. **Connectivity** [Rii23]. **Consequences** [DDGSF25]. **Considerations** [ADN$^+$23]. **Consistency** [Cal19, OWXZ21, SRR21]. **Constrained** [BTd22, VGWS19]. **Constraining** [RSC$^+$22]. **Constraint** [AU21, TLSV20]. **Constraints** [BLLR22, CWZ25, DDGSF25, WIM25]. **Construction** [ABF$^+$25, BLLR22]. **Contextual** [Zha22]. **Continuity** [PB24]. **Continuous** [Kur25, MRS20, YZWL25].

Continuous-Time [YZWL25]. **Continuously** [GPWS21]. **Contraction** [MHW$^+$24]. **Controlled** [BK23, CLT20]. **Controls** [GGWX21]. **Convergence** [BTd22, BCP22, CE25, CDS25, Fab25, GGWX21, GH21, HS25, LS23, LWL20, TM20, dBSLNW23]. **Convergent** [ZZST21]. **Convex** [AAR20, CS19, MHL$^+$24, MOPS20, SNS21, TMTS23, TLFS21, WCPL24]. **Convex-Concave** [MOPS20]. **Convolutional** [HH23, HB25, LPH$^+$23, ML19]. **Convolutions** [JB22]. **Cooperative** [GGWX21]. **Coordinate** [ADN$^+$23]. **Coping** [NPVB24]. **Core** [TH23, TH19]. **Core-Periphery** [TH23]. **Correct** [AG21]. **Correlated** [LMR$^+$20]. **Corruptions** [JNR25]. **Costs** [dBSLNW23]. **Count** [LZK22]. **Covariance** [HRS25, MAPM25]. **Cover** [ABF$^+$25]. **COVID** [HNP22]. **COVID-19** [HNP22]. **Critic** [CHS24]. **Cryo** [BE24]. **Cryo-Electron** [BE24]. **Crystallographic** [BE20]. **Cubic** [WIM25]. **CUR** [GH22]. **Curse** [BGJ20]. **Curvature** [FRZU24, GO25]. **Curve** [GPWS21]. **Cut** [LM20].

D [BKSU22]. **Data** [ACL19a, ACL19b, Bac21, BSV22, Bud25, Cal19, CW20, CMR$^+$21, CDS25, DH20, DYM$^+$22, ERK$^+$19, GPWS21, GBP$^+$24, HNP22, HYFB23, Kol19, LKA$^+$21, LMM22, PS21, Sau22, SBCG$^+$19, SGL$^+$20, TMTS23, TCSV24, Tri19, UT19, VFMS23, ZQW$^+$19]. **Data-Dependent** [ZQW$^+$19]. **Data-Driven** [TMTS23]. **Deadly** [CCM23]. **Decentralized** [LLC22]. **Decoding** [ERK$^+$19]. **Decomposition** [CR22, DR24, DLF25, GH22, KH20, KT21, Sau22, ZK23]. **Decompositions** [ARB20, BBS24, MSK20]. **Deconvolution** [CR22, KZLW20]. **Deep** [AD21, AAR20, BFT23, BGJ20, BGK22, BGKP19, CFLL23, CJLS25, CLT20, DMSV25, EGT$^+$21, GRS$^+$20, LPH$^+$23, LM25, MD19, NGBU23, PN22, YZWL25]. **Defense** [WYSO20]. **Definite** [MAPM25, FADS22]. **Degree** [Cho20]. **Denoising** [Lee21]. **Density** [KCR25, LC23, LMM22]. **Dependent** [CMR+21, KPR+21, ZQW+19]. **Depth** [BLO25]. **Depths** [MFM22]. **Descent** [Bac24, BHX20, CE25, DB22, GTM+24, GJX25, JNR25, MURB25, PB24, SM20, TMTS23]. **Design** [BM22, JN24]. **Designs** [LMR+20]. **DESTRESS** [LLC22]. **Detectability** [WWZM20]. **Detecting** [ZLZ20]. **Detection** [BRZ22, FKZ22, TH19, TH23]. **Determinantal** [FSS22]. **Determination** [HLZ22]. **Deterministic** [HZ21]. **Dictionary** [CG19, LZFZ25]. **Diffeomorphic** [PHBO25]. **Difference** [DMR21, KPR+21]. **Differential** [BGJ20, MFM22]. **Differentially** [BSV22]. **Differentiation** [BCP22]. **Diffuse** [BSV21]. **Diffusion** [BK23, CDS25, CDH+21, HMR+25, HTR+23, MHW+24, SBCG+19, YWTT25]. **Dimension** [BLLR22, BBG20, GO25, HS22]. **Dimensional** [Bac24, FP23, GKBD19, GBP+24, HMR+25, HYFB23, LR19, LMM22, PS21, VFMS23]. **Dimensionality** [BGJ20, FADS22, HHV22, LLP+25]. **Dimensions** [Atc21, BBP23, Her24, RBO21]. **Diploid** [BKSU22]. **Directed** [BFM+21, LLM22, Rii23]. **Direction** [WCPL24]. **Discovery** [DYM+22]. **Discrepancy** [KEB+24]. **Discrete** [BFT23]. **Discretizations** [BGK22]. **Dissimilarity** [HHvT22]. **Distance** [ANY19, BKSU22, DJRW20]. **Distances** [CDH+21, FILN20, LMM22]. **Distributed** [CBD21, DMR21, GIMA21]. **Distribution** [AT25, FMS25, MV22, TLFS21]. **Distributional** [BH22]. **Distributions** [CLLD22, GNZ23, HHvT22, HN19, LL24a]. **Divergence** [GH21]. **Divergences** [BDK+21]. **Diversity** [ABR19, FSS21]. **Do** [PN22]. **Domains** [AC20]. **Dorfman** [LL24a]. **Double** [Bac24, BHX20, DB22]. **Doubly** [LCK21, LC23]. **Driven** [CP20, TMTS23]. **Dual** [CC22, ZLZ24]. **Dynamical** [GTM+24, SST20, WTD+21]. **Dynamics** [CMR+21, LMXZ22].

Effectiveness [Bac21]. **Efficiency** [YJWS24]. **Efficient** [ABR19, BGS23, BNZ21, CBD21, CL25, LLC22, NRHvBW21, SNS21, YXKH25, ZZST21, ZRG23]. **Eigenspace** [CBD21]. **Eigenvalues** [TCTER21]. **Eigenvector** [Ben19]. **Electron** [BE24]. **Elementwise** [Fel25]. **Elementwise-Transformed** [Fel25]. **Embedding** [FADS22, LYZL25]. **Embeddings** [KSS20]. **Empirical** [BGJ20, KTM20]. **End** [HLZ22]. **End-to-End** [HLZ22]. **Energy** [HG24]. **Energy-Based** [HG24]. **Enforcing** [CDM25]. **EnResNet** [WYSO20]. **Ensemble** [CSAW22, WYSO20, WS25]. **Ensembles** [LWL20]. **Ensembling** [WS25]. **Entries** [BNZ21]. **Entropic** [Ker23, dBSLNW23]. **Entropy** [DDD+21]. **Entrywise** [Bud25]. **Equations** [BGJ20, GIK24, MFM22]. **Equilibria** [MHL+24]. **Equivalences** [KMDM24]. **Equivariant** [BH24, LLP+25]. **Ergodicity** [FT20]. **Erratum** [ACL19a]. **Error** [BGJ20, Li21, MD19, WTD+21, XCRW22]. **Errors** [DB22]. **Escape** [HLZ20]. **Estimates** [DMS22, FRZU24, JN24, LLM22, YZWL25]. **Estimating** [HET23, LAR25]. **Estimation** [BM22, BBT25, BDK+21, CBD21, GO25, HRS25, HN19, KCR25, MAPM25, MS24, PNW25, VMB+24, WTD+21, YXKH25, ZK23]. **Estimators** [BNS21]. **ETA** [YJWS24]. **Euclidean** [BKSU22]. **Evaluation** [GPWS21, LLP23]. **Evolution** [LQLS25]. **Evolving** [GPWS21]. **Exact**

[LMXZ22]. **Excess** [LJWH24]. **Expanders** [HZ21]. **Exponential** [CLLD22]. **Exponential-Wrapped** [CLLD22]. **Expressivity** [NPVB24]. **Extending** [SM20]. **Extensions** [FADS22]. **Extensive** [VFMS23]. **External** [ACBK25]. **Extraction** [CDJN21, MGHV21]. **Extrapolation** [Bac21, BTd22, HPG+22, HLG25]. **Extreme** [JS21, SNS21]. **Extremes** [MDS25].

Factor [DLF25]. **Factorization** [AG21, JCD23]. **Factorizations** [ZRG23]. **FANOK** [ARdE21]. **Fast** [AAR20, BSV21, BRZ22, CDH+21, Her24, LS23, ZLRY20, dBSLNW23]. **Faster** [MLGK25, ZBLR24]. **Fear** [NKK25]. **Feature** [CDJN21]. **Features** [BHX20, DYM+22, KMDM24, TOS25]. **Federated** [ZBLR24, ZLZ24]. **Feel** [Zha22]. **Feel-Good** [Zha22]. **Few** [BNZ21]. **Feynman** [WYSO20]. **Field** [GTM+24, GGWX21]. **Filters** [CSAW22]. **Finding** [GJX25]. **Finite** [BM22, Cal19, CHS24, DMR21, HN19, LR19, LLC22, WIM25]. **Finite-Dimensional** [LR19]. **Finite-Sum** [LLC22]. **Finite-Time** [CHS24, DMR21]. **First** [BRZ22, KL24, LBD25, SMRE25]. **First-Order** [KL24, LBD25, SMRE25]. **Fixed** [BBP23, Cho20, ZLZ24]. **Flow** [ACQ23]. **Flows** [GBP+24]. **Forests** [JABT25, LPH+23]. **Formalism** [WYSO20]. **Format** [MSK20]. **Formulation** [DL22, FP23]. **Forward** [DDGSF25]. **Foundations** [ACBK25]. **Fourier** [Her24, TOS25]. **Framework** [MNO20, ZQW+19]. **Fredholm** [GIK24]. **Free** [JCD23, MNW24]. **Frequency** [LMXZ22]. **Fully** [CMR+21]. **Function** [AC20, AD21, Bud25, DMR21, GIK24, HET23, LLP23, PU25]. **Function-Generated** [Bud25]. **Function-Space** [PU25]. **Functionals** [Tri19]. **Functions** [BV19, JS21, Lee21, LL24b, NGBU23, PN22]. **Fused** [ZZST21].

G [ABF+25]. **G-Mapper** [ABF+25]. **Games** [MRS20, MHL+24, YAY23]. **GAN** [BSCB22]. **Gap** [AD21, LPH+23]. **Gaps** [Atc21]. **GAT** [FWDJ23]. **GAT-GMM** [FWDJ23]. **Gaussian** [BLLR22, CR22, DHP22, FWDJ23, GKD19, GKBD19, KSAY24, LCK21, LAR25, SM25, VFMS23, WT22]. **GenCol** [FP23]. **General** [AC20, EY22, FP23]. **Generalization** [BGJ20, DB22, HHV22, Li21, LMXZ22, MKL25, XCRW22]. **Generalize** [NKK25, OT22]. **Generalized** [ABN21, GH22, PTG+23]. **Generated** [Bud25, HH23]. **Generating** [BSV22]. **Generation** [HMR+25]. **Generative** [FWDJ23, GNZ23, GBP+24, HH22, JTT+25, JB22, JC23, LYZL25, LKA+21, PHBO25]. **Generic** [CLT20]. **Genome** [BKSU22]. **Geometric** [GKBD19, MS24, PTG+23]. **Geometry** [BKSU22, HTR+23, KZLW20, LC23, LMM22, OT22]. **Given** [BBG20]. **Global** [BGS23, Coo21, PB24]. **GMM** [FWDJ23]. **GNMR** [ZN22]. **Good** [Zha22]. **Gossip** [BBG20]. **Goursat** [SCF+21]. **Gradient** [AMFF19, ACQ23, CE25, CMR+21, GTM+24, GJX25, GBP+24, HLRJ22, JNR25, LLRS23, MURB25, MRS20, MOPS20, PB24, SM20, WCPL24, YXKH25]. **Gradient-Based** [MRS20]. **Gradients** [KH20, PB24]. **Granger** [TLFS21]. **Graph** [ABARS20, ANY19, DH25, JB22, KSAY24, LMR+20, LLM22, MC23, PTG+23, Tri19, TM20, VGWS19]. **Graph-Based** [LMR+20, MC23, Tri19]. **Graphical** [ZZST21]. **Graphons** [MKL25]. **Graphs** [BSV21, BFM+21, CDS23, DLF25, JABT25, Ker23, Rii23]. **Greed** [HM21]. **Grids** [MD19]. **Gromov** [CWZ25, HRS25, HGL24, LYZL25]. **Group**

[LL24a, SV23, TCSV24]. **Group-Invariant** [SV23]. **Groups** [HHvT22]. **Guarantee** [BDS21, MLGK25]. **Guarantees** [ABN21, CDS25, HMZ22, TCSV24, ZZS23].

Hamilton [MFM22]. **Hard** [ABA22]. **Hardmax** [AFZ25]. **Harmonic** [DMOS25]. **Harmonic-Analytic** [DMOS25]. **Hausdorff** [ANY19]. **Hawkes** [YLB+19]. **Heavy** [PPPS24]. **Hessian** [ACU23]. **Hessian-Schatten** [ACU23]. **Heterogeneous** [CW20, Lee21]. **Heteroscedastic** [HYFB23]. **Heteroskedastic** [LCK21]. **Hidden** [SBCG+19]. **Hierarchical** [ABC19]. **High** [Atc21, Bac24, FP23, GBP+24, Her24, HYFB23, JTT+25, LMM22, PPPS24, PS21, RBO21]. **High-Dimensional** [Bac24, FP23, GBP+24, HYFB23, LMM22, PS21]. **Higher** [FT20]. **Higher-Order** [FT20]. **Highly** [LMR+20]. **Hitting** [BFM+21]. **Holistic** [ASE19]. **Homology** [HNP22, MNO20]. **Hypergraph** [Ben19, HZ21]. **Hypergraphs** [AAY24, CEH23, TH23]. **Hyperparameter** [SMRE25]. **Hyperplane** [BV19, DMS22].

Ideal [HS25]. **Identifiability** [AG21, CG19]. **Identification** [EH23, GIMA21, SST20, ZRG23]. **Identifying** [BKSU22]. **Ill** [BNZ21, TTV19]. **Ill-Conditioned** [BNZ21]. **Ill-Posedness** [TTV19]. **Image** [HMR+25, HHK23, LQLS25]. **Images** [HH23]. **Imaging** [HH22]. **Immunization** [TCTER21]. **Impacts** [HN19]. **Implementation** [ADN+23]. **Implications** [MWW22]. **Implicit** [FSS21, EGT+21, ZK23]. **Implicitly** [FSS22]. **Importance** [ZLRY20]. **Improved** [HM21, dBSLNW23]. **Improvement** [LM20]. **Improving** [BAKS24]. **Including** [ACBK25]. **Inconsistency** [BBP23]. **Independent** [KCR25, YAY23]. **index** [POW25]. **Indirect** [BH24]. **Induced** [GCPT20]. **Inequality** [BLLR22]. **Inertial** [MOPS20]. **Inexact** [SMRE25]. **Inference** [DLF25, HGL24, LC23]. **Infinite** [Cal19, HMR+25]. **Information** [CW20, ERK+19]. **Information-Theoretic** [ERK+19]. **Informed** [BLG+22, LQLS25]. **Inhomogeneous** [HTR+23]. **Initialization** [DH25]. **Initialized** [LS23]. **Input** [TMTS23]. **Input-Convex** [TMTS23]. **Insights** [MDS25, PN22]. **Instance** [KPR+21, LLP23]. **Instance-Dependent** [KPR+21]. **Instance-Optimal** [LLP23]. **Integral** [GIK24]. **Interface** [BSV21]. **Internal** [ACBK25]. **Interpolation** [CLT20, KMDM24, Li21, RDB20, XCRW22, XSC22]. **Interpolators** [WS25]. **Interpretable** [PS21]. **Intrinsic** [FILN20, HS22, ZQW+19]. **Introduction** [Kol19]. **Intuition** [DLB24]. **Invariant** [ADN+23, CL25, DMOS25, HHvT22, SV23]. **Invariants** [Kur25]. **Inverse** [HH22, HFL+22, JN24, LQLS25]. **ISLET** [ZLRY20]. **Isometric** [HHK23]. **Iterations** [BBG20]. **Iterative** [BNZ21].

Jacobi [BBG20, MFM22]. **Joining** [JAA+21]. **Joint** [FKZ22, FMS25]. **Jointly** [DYM+22]. **Journal** [Kol19].

Kac [WYSO20]. **Kaczmarz** [HM21]. **Kalman** [CSAW22]. **Katz** [CDM25]. **Kernel** [BBP23, CCMO25, FSS21, HS22, Her24, LCK21, Li21, LGL25, MDS25, SCF+21, VMB+24]. **Kernel-Based** [LGL25]. **Kernelized** [KEB+24]. **Kernels** [DMOS25, KMDM24, MV22, PHBO25]. **Kinds** [PN22]. **KL** [CDS25]. **Knockoffs** [ARdE21].

Label [JB22]. **Labeled** [Cal19]. **Landmark** [YWTT25]. **Landmarking** [GKD19, GKBD19]. **Langevin** [AT25, CMR+21, HHP24, LLRS23]. **Laplacian** [MC23, TM20]. **Laplacians**

[MWW22, MM23]. **Large** [KH20]. **Large-Scale** [KH20]. **Lasso** [ABN21, ZZST21, BBH23]. **Latent** [JAA+21]. **Lateration** [ACV25]. **Layer** [ASE19, BGS23, GRS+20, MT24]. **Layer-Parallel** [GRS+20]. **Layered** [CP20]. **Layers** [LQLS25, POW25]. **Learn** [PN22]. **Learner** [MURB25]. **Learners** [MURB25]. **Learning** [ABF+25, ACU23, BK23, BSV21, BH22, Cal19, CJLS25, CDS23, CCM23, CMS20, CG19, DB22, DLB24, DDGSF25, DMR21, FMS25, EGT+21, GIMA21, GGWX21, HHK23, JB22, JS21, KPR+21, LR19, LZFZ25, LL24b, LGL25, LLRS23, MRS20, MHL+24, MC23, NN24, SMRE25, SV23, YZWL25, YAY23, Zha22, ZBLR24, ZQW+19, MLGK25]. **Least** [ABC19, BNZ21, LS23, LGL25]. **Lévy** [JTT+25]. **Lie** [HHvT22]. **Like** [NRHvBW21]. **Likelihood** [HRS25]. **Limit** [GCPT20, dBSLNW23]. **Limits** [Tri19]. **Line** [ZN22]. **Linear** [ANY19, ARdE21, Bac24, BM22, DB22, DLB24, DMR21, GB23, JNR25, JN24, LLP23, LMXZ22, ML19, MNW24, POW25, Ver20, WS25]. **Linear-Time** [ANY19]. **Linearly** [ZZST21]. **Lipschitz** [Cal19, CP20, GBP+24, MS23, NGBU23, PB24]. **Lipschitz-Regularized** [GBP+24]. **Local** [CDS23, DM22, LM20, MV22, MS23]. **Localization** [YPWR24]. **Location** [ZYWL20]. **Log** [AT25, KCR25]. **Log-Concave** [AT25, KCR25]. **Logistic** [DH20]. **Lose** [DLB24]. **Loss** [GB23, Lee21, MURB25]. **Low** [ARB20, BNZ21, Bud25, CL25, HG24, MSK20, SM25, SGL+20, UT19, ZLRY20, ZN22]. **Low-Rank** [ARB20, Bud25, CL25, HG24, MSK20, SM25, SGL+20, ZLRY20].

Machine [DDGSF25, MURB25]. **Machines** [JS21]. **Majorization** [HPG+22, HLG25, PBGP24]. **Manifold** [BM20, FILN20, GO25, HHK23, HLZ20, LC23, LKA+21, LPH+23, MAPM25, NN24]. **Manifolds** [DL22, GKD19, KSAY24, LLP+25]. **Mapper** [ABF+25, ABF+25]. **Mapping** [HHK23]. **Maps** [LR19, NN24, VMB+24]. **Marginals** [MMZdO24]. **Markov** [Atc21, BFM+21, GCPT20, MV22]. **MARL** [GGWX21]. **Matching** [CMS20, PHBO25]. **Mathematical** [BE20]. **Mathematics** [Kol19]. **Matrices** [BNZ21, Bud25, Fel25, MAPM25, SM25, UT19]. **Matrix** [AG21, BSV21, EY22, GH22, GD25, HG24, JCD23, LZK22, LS23, Lee21, OPAB+21, Sau22, TTV19, ZRG23, ZN22]. **Matrix-Vector** [BSV21]. **Max** [JC23, KL24]. **Max-Affine** [KL24]. **Maximization** [PHLP19]. **Maximum** [DDD+21, DLF25, HRS25, HB25, TM20]. **MCMC** [AMFF19, KEB+24]. **Mean** [GTM+24, GGWX21, KSS20, MS24, YXKH25]. **Mean-Field** [GTM+24, GGWX21]. **Means** [SRR21]. **Measure** [ABR19, MGHV21, MM23, PHBO25]. **Measurements** [BH24]. **Measures** [CDM25, HHvT22]. **Measuring** [ACU23, LWL20]. **Median** [MS24]. **Memorizing** [ZQW+19]. **Memory** [MT24, SNS21, Ver20]. **Memory-Efficient** [SNS21]. **Message** [MKL25, TCSV24]. **Meta** [MLGK25]. **Meta-learning** [MLGK25]. **Method** [BCP22, BSCB22, MMZdO24, SMRE25, TH19]. **Methods** [AAY24, BM22, BSV21, CC22, DDD+21, DR24, FSS21, GTM+24, HHP24, HS22, HLRJ22, KL24, OPAB+21, ZLZ20]. **Metric** [BFM+21, CWZ25, MM23, VGWS19]. **Metric-Constrained** [VGWS19]. **Metric-Preserving** [CWZ25]. **Microscopy** [BE24]. **Min** [ABN21, JC23]. **Min-Max** [JC23]. **Minibatch** [NKK25]. **Minima** [Coo21]. **Minimal** [CDS25]. **Minimax** [BM22]. **Minimization** [ACV25, BGJ20, HPG+22, HLG25, LZFZ25, PBGP24].

Minimum [DJRW20, Li21]. **Mining** [Sau22]. **Mirror** [TMTS23]. **Missing** [VFMS23]. **Misspecified** [LJWH24]. **Mixing** [AT25, Atc21]. **Mixture** [CR22, DHP22, FWDJ23, MKL25, TLFS21, WIM25, ZK23]. **Mixtures** [HN19, LAR25, WT22]. **Model** [CDJN21, DHP22, GB23, HH22, JB22, JCD23]. **Model-Free** [JCD23]. **Modeling** [JTT$^+$25, LYZL25, PHBO25]. **Modelling** [VFMS23]. **Models** [AMFF19, BM22, BHX20, CR22, CL25, CDS25, FWDJ23, HMR$^+$25, JAA$^+$21, LJWH24, LST19, PHLP19, POW25, SST20, WIM25, ZK23]. **Modes** [RSC$^+$22]. **Modularity** [PHLP19, WWZM20]. **Moment** [LAR25, ZK23]. **Moments** [Cho20]. **Mondrian** [OT22]. **Monge** [HGL24, LYZL25]. **Monotone** [LYZL25]. **Morphometrics** [GKBD19]. **Motzkin** [HM21]. **Moving** [ACQ23]. **MR** [LKA$^+$21]. **MR-AN** [LKA$^+$21]. **Multi** [ASE19, POW25, RBO21, SRR21]. **Multi-armed** [SRR21]. **Multi-index** [POW25]. **Multi-Layer** [ASE19]. **Multi-Reference** [RBO21]. **Multiagent** [YAY23]. **Multiclass** [DH20]. **Multicomponent** [CW20]. **Multidimensional** [ACBK25]. **Multifidelity** [MAPM25]. **Multigraphs** [Cho20]. **Multikernel** [AU21]. **Multilayer** [BSV21, PHLP19, WWZM20]. **Multilevel** [CJLS25, HMR$^+$25]. **Multilinear** [ML19]. **Multimodal** [DYM$^+$22, SBCG$^+$19]. **Multiple** [ZZST21]. **Multireference** [BE24, PWB$^+$19]. **Multitemporal** [CDH$^+$21]. **Multitype** [JABT25]. **Multivariate** [AC20, BBT25, MDS25, PU25, YLB$^+$19].

Natural [CHS24]. **Near** [AC20, BK23]. **Near-Optimal** [AC20]. **Nearest** [XSC22]. **negative** [PBK25]. **Neighbor** [JAA$^+$21, XSC22]. **Neighborhood** [MGHV21]. **Network** [BDES25, BDK$^+$21, CCM23, CP20, HS25, LM25, RDB20, Rii23, WCPL24, YZWL25, YPWR24, YLB$^+$19]. **Networks** [AD21, AAR20, BGS23, BBS24, BFT23, BLG$^+$22, BH24, BGJ20, BBG20, BGK22, BGKP19, BRZ22, CFLL23, CLM$^+$22, CE25, CJLS25, CDM25, Coo21, CDH$^+$21, CLT20, CZD$^+$20, DH25, DMSV25, Fab25, GNZ23, GIK24, GRS$^+$20, HH23, HLZ22, HB25, JC23, LKA$^+$21, LLM22, LPH$^+$23, LLRS23, MT24, ML19, MKL25, MD19, NPVB24, NGBU23, NRHvBW21, PHLP19, PN22, POW25, PTG$^+$23, SV23, TMTS23, TL24, TH19, Ver20, ZLZ20, ZZS23]. **Neural** [AD21, AAR20, BFT23, BLG$^+$22, BH24, BDES25, BGJ20, BDK$^+$21, BGK22, BGKP19, CFLL23, CLM$^+$22, CCMO25, CE25, CJLS25, Coo21, CLT20, CZD$^+$20, DH25, DMSV25, Fab25, GIK24, GRS$^+$20, HH23, HS25, HLZ22, HB25, LLM22, LM25, LLRS23, MT24, NPVB24, NGBU23, NRHvBW21, PN22, PU25, POW25, PTG$^+$23, TMTS23, Ver20, WCPL24, ZZS23]. **Newton** [WIM25]. **NMF** [HLG25]. **NN** [Tri19]. **No** [NN24]. **No-Collision** [NN24]. **Node** [TCTER21]. **Noise** [ACV25, LCK21, MV22, PPPS24]. **Noiseless** [BSV22]. **Noisy** [EY22, FILN20]. **Non** [PBK25]. **Non-negative** [PBK25]. **Nonasymptotic** [CE25, LJWH24]. **Nonbacktracking** [CEH23, TCTER21]. **Nonconcave** [JC23]. **Nonconvex** [CMR$^+$21, HLRJ22, JC23, LLC22, LLRS23, MOPS20]. **Nonconvex-Nonconcave** [JC23]. **Nonconvexity** [DDGSF25]. **Nonlinear** [CW25, LR19, LLM22, MLGK25, OPAB$^+$21, Sau22, TH19]. **Nonlinearities** [PU25]. **Nonnegative** [CL25]. **Nonparametric** [WIM25, ZK23]. **Nonsmooth** [CW25, HHP24, JC23]. **Nonstationary** [Suk25]. **Nonuniform** [AAY24, CEH23]. **Norm** [Li21]. **Normal** [ZG21]. **Normal-Bundle** [ZG21].

Normalization [LCK21]. **Norms** [DM22]. **Note** [HH23]. **Notion** [SGN22]. **NP** [ABA22]. **NP-Hard** [ABA22]. **Numerical** [ADN+23, BGJ20]. **Nyström** [PBK25].

Objects [MM23]. **Oblique** [LPH+23]. **Observations** [SST20]. **ODEs** [CLT20]. **Off** [BAKS24, GB23]. **One** [ZN22]. **One-Line** [ZN22]. **Online** [KEB+24, MURB25, YPWR24]. **Operating** [GPWS21]. **Operator** [EY22, MHL+24, MMZdO24]. **Operators** [CP20, PBK25, SBCG+19]. **Optimal** [AC20, AGL21, ABC19, BBT25, BGKP19, CWZ25, CCNP23, CC22, FP23, Ker23, KPR+21, KTM20, LL24a, LLC22, LLP23, VMB+24, WCPL24, ZLRY20, ZYWL20]. **Optimality** [BK23, JC23, PU25]. **Optimally** [HYFB23, NKK25]. **Optimization** [ABN21, BGS23, BNS21, BRZ22, CW25, DL22, FRZU24, HLRJ22, HLZ20, KSAY24, LBD25, LLC22, LST19, MOPS20, SMRE25, SNS21, VGWS19, WCPL24]. **Order** [BRZ22, CR22, FT20, JTT+25, KL24, LBD25, SMRE25]. **Order-3** [CR22]. **Ordinal** [ACBK25]. **Organisms** [BKSU22]. **Organization** [BKSU22]. **Out-of-Sample** [FADS22]. **Outer** [YXKH25]. **Overcome** [CCM23]. **Overcomes** [BGJ20]. **Overcomplete** [CR22]. **Overfitting** [WT22]. **Overlapping** [ZLZ20]. **Overparameterization** [XCRW22]. **Overparameterized** [Coo21, HHV22]. **Overparametrized** [JCD23].

PageRank [CDM25]. **Pairs** [GH22]. **PARAFAC2** [RSC+22]. **Parallel** [GRS+20]. **Parameter** [HN19]. **Parameters** [MHW+24]. **Part** [KT21]. **Partial** [BGJ20]. **Particle** [BE24, GBP+24]. **Partition** [HET23]. **Partitioning** [HS22]. **Passing** [MKL25, TCSV24]. **Path** [LMM22]. **Paths** [BFT23, YAY23]. **Pattern** [MGHV21, ZQW+19]. **PCA** [GO25, HYFB23, MDS25, TTV19]. **PDE** [SCF+21]. **Penalty** [ABN21]. **Performance** [BDS21, DMR21, LST19]. **Periodic** [Kur25]. **Periphery** [TH23, TH19]. **Persistent** [CW20, HNP22, MNO20, MWW22]. **Perspective** [BBH23, CFLL23, MHW+24]. **Phase** [BE20, BDES25, RBO21, TLSV20]. **Physics** [LQLS25]. **Physics-Informed** [LQLS25]. **PIDE** [BGK22]. **Piggyback** [BCP22]. **Piggyback-Style** [BCP22]. **Planted** [GJX25]. **Plug** [PNW25]. **Plug-in** [PNW25]. **Point** [BCP22, FSS22, SNS21, YPWR24, ZZST21, ZLZ24]. **Points** [BM20, SM20]. **Poisson** [MC23]. **Policy** [LLP23]. **Polyhedral** [JN24]. **Polynomial** [BV19, BBG20, Kur25, LAR25]. **POMDPs** [CHS24]. **Pontryagin** [HB25]. **Pooled** [ERK+19, TCSV24]. **Posedness** [TTV19]. **Positive** [FADS22, KT21, MAPM25]. **Positive-Semidefinite** [KT21]. **Positivity** [CCMO25, NPVB24]. **Possible** [WIM25]. **Post** [ZZS23]. **Post-training** [ZZS23]. **Posterior** [MHW+24]. **Posteriori** [DLF25]. **Potential** [HET23]. **Potentials** [HHP24]. **Powering** [ABARS20]. **Practical** [ABN21, Fab25]. **Practice** [AD21, DDD+21]. **Predict** [MHL+24]. **Prediction** [YJWS24]. **Predictors** [GB23, MS23]. **Presence** [ACV25, VFMS23]. **Preserving** [CWZ25]. **Primal** [CC22, ZLZ24]. **Primal-Dual** [CC22]. **Principle** [HB25, LMXZ22, TM20]. **Principles** [DH25]. **Priori** [LLM22, YZWL25]. **Priors** [BDES25]. **Private** [BSV22]. **Pro** [NRHvBW21]. **Probabilistic** [VFMS23]. **Probabilities** [BFM+21]. **Probability** [GNZ23, PPPS24]. **Problem** [BE20, EH23, MGHV21]. **Problems** [BCP22, CC22, FSS22, HH22, HFL+22, JC23, JN24, LMR+20, ZZST21]. **Procedure** [DJRW20]. **Process** [GKD19, GKBD19, MHW+24, OT22, VFMS23]. **Processes** [BLLR22, BK23, FSS22, FT20, KSAY24, YLB+19]. **Product** [GD25].

Products [BSV21, YXKH25]. **Programming** [FKZ22, YTF+21]. **Programs** [AdE22]. **Project** [DR24]. **Projection** [Fab25, NRHvBW21]. **Projections** [Bac24, HFL+22, LGL25]. **Propagation** [JB22, WWZM20]. **Properties** [Fel25, GCPT20, JS21, MWW22]. **Provable** [BLG+22, ZZS23, ZN22]. **Provably** [AG21, LZFZ25, LS19]. **Proximal** [LST19, MOPS20, ZZST21]. **Pruning** [AAR20, BLG+22, CFLL23]. **PSD** [HG24]. **PSD-Matrix** [HG24]. **Pseudoinverse** [LPJ+24]. **Pure** [AFZ25]. **Pure-Attention** [AFZ25]. **Push** [DDGSF25]. **Push-Forward** [DDGSF25].

Q [BK23, GGWX21]. **Q-Learning** [GGWX21]. **Quadratic** [BGS23, MURB25]. **Quadratic-Time** [BGS23]. **Quality** [BLO25]. **Quantiles** [BBT25]. **Quantitative** [CLM+22, TCSV24]. **Quantization** [ZZS23].

Random [Bac24, BV19, BM20, Cho20, DMS22, Fab25, JABT25, Ker23, LPH+23, LGL25, MM23, SM25, TL24, TOS25]. **Randomized** [BLO25, DR24, FRZU24, HMZ22, LWL20, MSK20, PBK25, SM25]. **Randomly** [LS23]. **Rank** [ARB20, BNZ21, Bud25, CL25, HLZ22, HG24, LZK22, MSK20, SM25, SGL+20, UT19, ZLRY20, ZN22]. **Rankability** [ACL19a, ACL19b]. **Rates** [MLGK25, MHW+24, ZBLR24, dBSLNW23]. **Real** [BBS24]. **Real-World** [BBS24]. **Receiver** [GPWS21]. **Recommendations** [ABR19]. **Reconstruction** [CW25, FILN20, JAA+21, LR19, YLB+19]. **Recovering** [CS19, SBCG+19]. **Recovery** [ABN21, BNZ21, ZN22]. **Rectified** [JNR25, Ver20]. **Recurrent** [CE25]. **Recursive** [GCPT20, GH21]. **Reduced** [PBGP24]. **Reduction** [BLLR22, FADS22, HHV22, LLP+25, ZBLR24]. **Reference** [RBO21]. **Registration** [VFMS23]. **Regression** [ARB20, AU21, Bac24, BBP23, DB22, DLB24, DH20, FSS22, KL24, LMR+20, LWL20, MAPM25, MNW24, ZLRY20]. **Regressions** [HHV22]. **Regressors** [TM20]. **Regularity** [HH23]. **Regularization** [CFLL23, FSS21, HHV22, JCD23, LMR+20, WT22, ZQW+19]. **Regularize** [FSS22]. **Regularized** [BBT25, CL25, GBP+24, KTM20, LKA+21, LGL25, ZZST21]. **Regularizers** [LQLS25]. **Reinforcement** [BH22, YZWL25, YAY23, Zha22]. **Relating** [PHLP19]. **Relative** [ANY19]. **Reliable** [FRZU24]. **Reloaded** [BBH23]. **ReLU** [BGS23, BDES25, DH25, MD19, POW25]. **Removal** [TCTER21]. **Rényi** [BDK+21]. **Representation** [GD25]. **Representations** [BDK+21]. **Resampling** [HMZ22]. **Residual** [GRS+20, YZWL25]. **ResNets** [WYSO20]. **Resolving** [AT25]. **Restriction** [SM20]. **Results** [CLM+22]. **Retrieval** [BE20, BDES25, TLSV20]. **Reuse** [GPWS21]. **Reveals** [LZK22]. **Reversible** [HGL24]. **Reweighted** [MC23]. **Richardson** [Bac21]. **Ridge** [JS21]. **Ridgeless** [BBP23]. **Riemannian** [DMOS25, DL22, FILN20]. **Rigidity** [TTV19]. **Rigorous** [GTM+24, KSS20, TCSV24]. **Risk** [BGJ20, LJWH24, SRR21]. **Robust** [DHP22, LCK21, LC23, MS24, MNW24, TTV19]. **Robustness** [ABARS20, BAKS24, MS23, NPVB24]. **Role** [AFZ25, MGHV21, WS25]. **Root** [MNW24]. **Rotational** [FKZ22]. **Rough** [BFT23]. **Rules** [EH23].

Saddle [BCP22, HLZ20, SM20]. **Saddle-Point** [BCP22]. **Safe** [EH23]. **Sample** [BE24, FADS22, HHvT22, PWB+19, RBO21, SRR21]. **Sampler** [HGL24]. **Sampling** [AC20, AT25, ABC19,

BSV22, FSS21, HHP24, HM21, HG24, MV22, MC23, SNS21, Zha22]. **Satisficing** [YAY23]. **Scalable** [AAY24, YTF+21]. **Scale** [CL25, KH20]. **Scale-Invariant** [CL25]. **Scaling** [ACBK25, LC23]. **Scarce** [GBP+24]. **Scattering** [PTG+23]. **Schatten** [ACU23]. **Schedules** [NKK25]. **Scheme** [BTd22]. **Schemes** [ACU23, LR19, PPPS24]. **Scholes** [BGJ20]. **Schrödinger** [PNW25]. **Science** [Bac21, Kol19]. **Scientific** [LKA+21]. **Score** [CDS25, HMR+25]. **Score-Based** [HMR+25]. **SCOTT** [ZYWL20]. **SDE** [JTT+25]. **Segmentation** [LQLS25]. **Select** [NKK25]. **Selection** [ADN+23, DH25, DJRW20]. **Self** [PBK25]. **Self-Adjoint** [PBK25]. **Semi** [BSV21, FADS22]. **Semi-definite** [FADS22]. **Semi-supervised** [BSV21]. **Semialgebraic** [BDES25]. **Semidefinite** [FKZ22, KT21, YTF+21]. **Semiparametric** [FSS22]. **Sensing** [BBH23, LM20, LS23, ML19]. **Sensitivity** [BLG+22]. **Sensitivity-Informed** [BLG+22]. **Sentiment** [AFZ25]. **Separability** [DH20]. **Sequences** [Cho20, Kur25]. **Sequential** [ACV25, ABC19, BLLR22, HG24]. **Seriation** [AGL21, CCNP23]. **Series** [TLFS21]. **Sets** [HLZ20]. **Setting** [LWL20]. **Shape** [VFMS23, WIM25, ZYWL20]. **Shape-Location** [ZYWL20]. **Sharp** [DR24, DMS22, ERK+19]. **Shifting** [EY22]. **Short** [KZLW20]. **Short-and-Sparse** [KZLW20]. **SIAM** [Kol19]. **Signals** [Lee21]. **Signature** [SCF+21, TOS25]. **Similarity** [MGHV21]. **SIMODS** [Kol19]. **Simple** [CCNP23, LZFZ25]. **Simplex** [AG21]. **Simplex-Structured** [AG21]. **Simplicial** [Rii23]. **Simulation** [HGL24, JTT+25]. **Simulation-Based** [HGL24]. **Single** [BE24, POW25]. **Single-** [POW25]. **Single-Particle** [BE24]. **Singular** [DR24]. **Singularity** [HN19]. **Size** [GB23, SM20]. **Sketch** [DR24]. **Sketch-and-Project** [DR24]. **Sketched** [LPJ+24]. **Sketching** [ZLRY20]. **SketchySGD** [FRZU24]. **Slicing** [Her24]. **Slope** [MNW24, EH23]. **Smooth** [DYM+22, MT24, Suk25, VMB+24]. **Smoothed** [YXKH25]. **Smoothing** [BAKS24]. **SNE** [LS19]. **Soft** [ABN21]. **Soft-Min** [ABN21]. **Solution** [BNS21, SCF+21]. **Solutions** [BCP22, EH23]. **Solves** [LZFZ25]. **Some** [GCPT20]. **SoS** [VMB+24]. **Space** [AMFF19, LBD25, LM25, PU25]. **Spaces** [ABC19, BBT25, CLLD22, DMOS25]. **Spanning** [JABT25]. **Sparse** [ASE19, ARB20, ABN21, AdE22, BE24, GIMA21, JABT25, KZLW20, LAR25, MNW24, MD19, MS23, Sau22, TLSV20, ZRG23]. **Sparsely** [BGKP19]. **Sparsity** [AG21, AU21]. **Sparsity-Based** [AG21]. **Spatial** [HNP22]. **Spatiotemporal** [HNP22, YLB+19]. **Spectral** [ABARS20, Atc21, BBS24, BDS21, CEH23, DMSV25, DYM+22, Fel25, JAA+21, LM25, TH19, WTD+21, ZLZ20]. **Speedy** [BH22]. **Spheres** [LST19]. **Spiked** [Fel25]. **Spline** [NGBU23, PN22]. **Splines** [FP23]. **Splitting** [MHL+24, MMZdO24]. **Square** [MNW24]. **Square-Root** [MNW24]. **Squares** [ABC19, BNZ21, LS23, LGL25]. **Stability** [ACV25, BFT23]. **Standard** [BCP22]. **State** [AMFF19, CDH+21]. **States** [GD25]. **Stationary** [AT25]. **Statistical** [BM22, HMZ22, KTM20, MM23]. **Stein** [KEB+24]. **Step** [SM20]. **Step-Size** [SM20]. **Steps** [BSCB22]. **Stiefel** [LLP+25]. **Stochastic** [AMFF19, BNS21, BBT25, CMR+21, DH20, FT20, FRZU24, GTM+24, GCPT20, GH21, HLRJ22, JNR25, KH20, LCK21, LC23, LLRS23, OT22, PHLP19, PPPS24, PBGP24, SST20, YAY23]. **Stop** [ZQW+19]. **Strategies** [AC20]. **Streaming** [JNR25, SGL+20]. **Streams** [CMR+21]. **Stress** [ACV25]. **Strict** [AGL21, CCNP23, HLZ20, SM20]. **Stride**

[BSCB22]. **Structural** [CDS23, CZD+20, TL24]. **Structure** [WWZM20]. **Structured** [AG21, CFLL23, KMDM24, SNS21]. **Structures** [CP20, HN19]. **Studies** [DLB24, HNP22]. **Style** [BCP22]. **Subgradient** [HHP24, PPPS24]. **Subspace** [CZD+20, LL24b, YXKH25]. **Sum** [DM22, LLC22]. **Sum-of-Norms** [DM22]. **Summation** [Her24]. **Supervised** [CWZ25, SV23, BSV21]. **Support** [WT22]. **SVMs** [KMDM24]. **Symmetric** [CLLD22, DMOS25, LL24a, MAPM25]. **Symmetry** [KZLW20]. **Synchronization** [FKZ22, JABT25]. **Synthesis** [DDD+21]. **Synthetic** [BSV22]. **System** [ABR19]. **System-Wide** [ABR19]. **Systems** [EY22, JNR25, LAR25].

Tail [DJRW20]. **Tailed** [PPPS24]. **Taking** [BSCB22]. **Taming** [LLRS23]. **Tangent** [CCMO25]. **Target** [CCM23]. **Targeted** [TCTER21]. **Tasks** [DB22]. **Teaching** [MURB25]. **Temporal** [DMR21, KPR+21]. **Temporal-Difference** [DMR21]. **Tensor** [ARB20, AAY24, CR22, HZ21, HLZ22, KH20, MSK20, OPAB+21, SV23, SGL+20, ZLRY20, ZK23]. **Tensors** [BV19]. **Tessellations** [DMS22]. **Test** [GB23, GPWS21]. **Testing** [LL24a, TCSV24]. **Texture** [DDD+21]. **Theorem** [dBSLNW23]. **Theorems** [DH20, GD25]. **Theoretic** [ERK+19]. **Theoretical** [ACBK25]. **Theory** [AD21, BE20, DDD+21, Fab25, GTM+24, KTM20, KSS20, PN22]. **Thinning** [KEB+24]. **Thompson** [Zha22]. **Three** [Ben19, GKBD19, MHL+24, VFMS23]. **Three-Dimensional** [GKBD19, VFMS23]. **Three-Operator** [MHL+24]. **Threshold** [BV19, DJRW20, Ver20]. **Time** [ANY19, AT25, ARdE21, BGS23, BSCB22, CHS24, DMR21, HTR+23, Kur25, TLFS21, YZWL25]. **Time-Inhomogeneous** [HTR+23]. **Times** [Atc21]. **Tomographic** [CW25]. **Topology** [HTR+23]. **Total** [ACU23]. **Trace** [CJLS25]. **Trace-Class** [CJLS25]. **Tracking** [ZYWL20]. **Trade** [BAKS24, GB23]. **Trade-Off** [BAKS24, GB23]. **Train** [NRHvBW21, SV23]. **Training** [BGS23, BSCB22, FWDJ23, GIK24, GB23, GRS+20, HS25, HLZ22, HB25, NRHvBW21, ZZS23]. **Transfer** [CMS20, DB22, DLB24]. **Transformed** [Fel25]. **Transformers** [AFZ25]. **Transforms** [Her24, PTG+23]. **Transition** [RBO21]. **Transport** [BBT25, CWZ25, CC22, CDJN21, FP23, Ker23, KTM20, VMB+24, ZYWL20]. **Transportation** [NN24, dBSLNW23]. **Tree** [ACQ23, JAA+21]. **Trees** [CS19]. **Triad** [CCM23]. **Triadic** [BBS24]. **Trigonometric** [XCRW22]. **Trimmed** [ABN21]. **Truncation** [CCM23]. **Tseng** [BSCB22]. **Tucker** [ARB20, MSK20, SGL+20]. **Tukey** [BLO25, MFM22]. **Tuning** [MNW24]. **Tuning-Free** [MNW24]. **TUSLA** [LLRS23]. **Tverberg** [DH20]. **Two** [BGS23, BHX20, BSCB22, MT24]. **Two-Layer** [BGS23].

Uncertainty [MURB25, MC23]. **Understanding** [PTG+23]. **Unfolding** [ACBK25]. **Uniform** [Cho20, TM20]. **Unifying** [JB22]. **Unit** [Ver20]. **Universal** [CLT20, CZD+20, GB23]. **Unknown** [BM22]. **Unlabeled** [Cal19]. **Using** [ARB20, ACU23, BSV21, BBG20, GNZ23, GJX25, GPWS21, GH21, HNP22, LAR25, MD19, NGBU23, ZLZ20].

Value [DR24]. **Valued** [CLM+22]. **Vanishing** [MV22]. **Var** [NRHvBW21]. **Variable** [NRHvBW21]. **Variance** [PBGP24, SGN22, ZBLR24]. **Variance-Reduced** [PBGP24]. **Variation** [ACU23]. **Variational** [BBH23, BDK+21, DL22, HH22, PN22, Tri19]. **Varying**

[LL24b]. **Vector** [BTd22, BSV21]. **Vectors** [WT22]. **Versions** [DM22]. **Via** [MM23, BAKS24, BFT23, BKSU22, CFLL23, CW25, CDS23, DR24, DLF25, FKZ22, FRZU24, HLZ22, Her24, KL24, KSAY24, LYZL25, LLRS23, MAPM25, MMZdO24, MNW24, SNS21, WYSO20, WCPL24, YXKH25, ZLRY20].

Walks [TL24]. **Wasserstein** [ABA22, CWZ25, CC22, FP23, GNZ23, GH21, HHK23, HRS25, HFL+22, HMZ22, LBD25, MMZdO24, WCPL24]. **Wasserstein-Based** [HFL+22]. **Wassmap** [HHK23]. **Way** [ASE19]. **Weak** [BHX20]. **Weighted** [ABC19, HYFB23, Lee21, Li21, LLM22, XCRW22]. **Weights** [TL24]. **Wide** [ABR19]. **Win** [DLB24]. **Without** [HET23, NKK25]. **Works** [HM21]. **World** [BBS24]. **Wrapped** [CLLD22].

X [TCTER21]. **X-Centrality** [TCTER21].

Zeros [EH23, Sau22].

References

Aghasi:2020:FCP

[AAR20] Alireza Aghasi, Afshin Abdi, and Justin Romberg. Fast convex pruning of deep neural networks. *SIAM Journal on Mathematics of Data Science*, 2(1): 158–188, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Aksoy:2024:STM

[AAY24] Sinan G. Aksoy, Ilya Amburg, and Stephen J. Young. Scalable tensor methods for nonuniform hypergraphs. *SIAM Journal on Mathematics of Data Science*, 6(2):481–503, June 2024. CODEN SJMDAQ. ISSN 2577-0187.

Altschuler:2022:WBN

[ABA22] Jason M. Altschuler and Enric Boix-Adserà. Wasserstein barycenters are NP-hard to compute. *SIAM Journal on Mathematics of Data Science*, 4(1):179–203, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1390062`.

Abbe:2020:GPS

[ABARS20] Emmanuel Abbe, Enric Boix-Adserà, Peter Ralli, and Colin Sandon. Graph powering and spectral robustness. *SIAM Journal on Mathematics of Data Science*, 2(1):132–157, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Arras:2019:SSO

[ABC19] Benjamin Arras, Markus Bachmayr, and Albert Cohen. Sequential sampling for optimal weighted least squares approximations in hierarchical spaces. *SIAM Journal on Mathematics of Data Science*, 1(1):189–207, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Alvarado:2025:GML

[ABF+25] Enrique Alvarado, Robin Belton, Emily Fischer, Kang-Ju Lee, Sourabh Palande, Sarah Percival, and Emilie Purvine. G-Mapper: Learning a cover in the mapper construction. *SIAM Journal on Mathematics* of *Data Science*, 7(2):572–596, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1641312`.

Amir:2021:TLS

[ABN21] Tal Amir, Ronen Basri, and Boaz Nadler. The trimmed lasso: Sparse recovery guarantees and practical optimization by the generalized soft-min penalty. *SIAM Journal on Mathematics of Data Science*, 3(3):900–929, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Antikacioglu:2019:NSW

[ABR19] Arda Antikacioglu, Tanvi Bajpai, and R. Ravi. A new system-wide diversity measure for recommendations with efficient algorithms. *SIAM Journal on Mathematics of Data Science*, 1(4):759–779, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Adcock:2020:NOS

[AC20] Ben Adcock and Juan M. Cardenas. Near-optimal sampling strategies for multivariate function approximation on general domains. *SIAM Journal on Mathematics of Data Science*, 2(3):607–630, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Arias-Castro:2025:TFO

[ACBK25] Ery Arias-Castro, Clément Berenfeld, and Daniel Kane. Theoretical foundations of ordinal multidimensional scaling, including internal unfolding and external unfolding. *SIAM Journal on Mathematics of Data Science*, 7(3):1422–1440, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1691624`.

Anderson:2019:ERD

[ACL19a] Paul Anderson, Timothy Chartier, and Amy Langville. Erratum: The rankability of data. *SIAM Journal on Mathematics of Data Science*, 1(3): 643–646, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187. See [ACL19b].

Anderson:2019:RD

[ACL19b] Paul Anderson, Timothy Chartier, and Amy Langville. The rankability of data. *SIAM Journal on Mathematics of Data Science*, 1(1):121–143, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187. See erratum [ACL19a].

Arias-Castro:2023:MCT

[ACQ23] Ery Arias-Castro and Wanli Qiao. Moving up the cluster tree with the gradient flow. *SIAM Journal on Mathematics of Data Science*, 5(2):400–421, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1469869`.

Aziznejad:2023:MCL

[ACU23] Shayan Aziznejad, Joaquim Campos, and Michael Unser. Measuring complexity of learning schemes using Hessian-schatten total variation. *SIAM Journal on Mathematics of Data Science*, 5(2):422–445, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M147517X.

Arias-Castro:2025:SSL

[ACV25] Ery Arias-Castro and Siddharth Vishwanath. Stability of sequential lateration and of stress minimization in the presence of noise. *SIAM Journal on Mathematics of Data Science*, 7(3):1077–1097, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1661790.

Adcock:2021:GBT

[AD21] Ben Adcock and Nick Dexter. The gap between theory and practice in function approximation with deep neural networks. *SIAM Journal on Mathematics of Data Science*, 3(2):624–655, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Askari:2022:ABS

[AdE22] Armin Askari, Alexandre d'Aspremont, and Laurent El Ghaoui. Approximation bounds for sparse programs. *SIAM Journal on Mathematics of Data Science*, 4(2):514–530, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1398677.

Archimbaud:2023:NCN

[ADN+23] Aurore Archimbaud, Zlatko Drmac, Klaus Nordhausen, Una Radojicić, and Anne Ruiz-Gazen. Numerical considerations and a new implementation for invariant coordinate selection. *SIAM Journal on Mathematics of Data Science*, 5(1):97–121, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M1498759.

Alcalde:2025:CPA

[AFZ25] Albert Alcalde, Giovanni Fantuzzi, and Enrique Zuazua. Clustering in pure-attention hardmax transformers and its role in sentiment analysis. *SIAM Journal on Mathematics of Data Science*, 7(3):1367–1393, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M167086X.

Abdolali:2021:SSM

[AG21] Maryam Abdolali and Nicolas Gillis. Simplex-structured matrix factorization: Sparsity-based identifiability and provably correct algorithms. *SIAM Journal on Mathematics of Data Science*, 3(2):593–623, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Armstrong:2021:OAS

[AGL21] Santiago Armstrong, Cristóbal Guzmán, and Carlos A. Sing Long. An optimal algorithm for strict circular seriation. *SIAM Journal on Mathematics of Data Science*, 3(4):1223–1250, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Aicher:2019:SGM

[AMFF19] Christopher Aicher, Yi-An Ma, Nicholas J. Foti, and Emily B. Fox. Stochastic gradient MCMC for state space models. *SIAM Journal on Mathematics of Data Science*, 1(3):555–587, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Aksoy:2019:LTA

[ANY19] Sinan G. Aksoy, Kathleen Nowak, and Stephen J. Young. A linear-time algorithm and analysis of graph relative Hausdorff distance. *SIAM Journal on Mathematics of Data Science*, 1(4):647–666, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Ahmed:2020:TRU

[ARB20] Talal Ahmed, Haroon Raja, and Waheed U. Bajwa. Tensor regression using low-rank and sparse Tucker decompositions. *SIAM Journal on Mathematics of Data Science*, 2(4):944–966, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Askari:2021:FKL

[ARdE21] Armin Askari, Quentin Rebjock, Alexandre d'Aspremont, and Laurent El Ghaoui. FANOK: Knockoffs in linear time. *SIAM Journal on Mathematics of Data Science*, 3(3):833–853, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Aberdam:2019:MLS

[ASE19] Aviad Aberdam, Jeremias Sulam, and Michael Elad. Multilayer sparse coding: The holistic way. *SIAM Journal on Mathematics of Data Science*, 1(1):46–77, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Altschuler:2025:RMT

[AT25] Jason M. Altschuler and Kunal Talwar. Resolving the mixing time of the Langevin algorithm to its stationary distribution for log-concave sampling. *SIAM Journal on Mathematics of Data Science*, 7(3):993–1020, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1638689`.

Atchade:2021:ASG

[Atc21] Yves F. Atchadé. Approximate spectral gaps for Markov chain mixing times in high dimensions. *SIAM Journal on Mathematics of Data Science*, 3(3):854–872, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Aziznejad:2021:MRS

[AU21] Shayan Aziznejad and Michael Unser. Multikernel regression with sparsity constraint. *SIAM Journal on Mathematics of Data Science*, 3(1):201–224, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Bach:2021:ERE

[Bac21] Francis Bach. On the effectiveness of Richardson extrapolation in data science. *SIAM Journal on Mathematics of Data Science*, 3(4):1251–1277, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Bach:2024:HDA

[Bac24] Francis Bach. High-dimensional analysis of double descent for linear regression with random projections. *SIAM Journal on Mathematics of Data Science*, 6(1):26–50, February 2024. CODEN SJMDAQ. ISSN 2577-0187.

Bai:2024:IAR

[BAKS24] Yatong Bai, Brendon G. Anderson, Aerin Kim, and Somayeh Sojoudi. Improving the accuracy-robustness tradeoff of classifiers via adaptive smoothing. *SIAM Journal on Mathematics of Data Science*, 6(3):788–814, August 2024. CODEN SJMDAQ. ISSN 2577-0187.

Berthier:2020:AGN

[BBG20] Raphaël Berthier, Francis Bach, and Pierre Gaillard. Accelerated gossip in networks of given dimension using Jacobi polynomial iterations. *SIAM Journal on Mathematics of Data Science*, 2(1):24–47, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Berk:2023:LRV

[BBH23] Aaron Berk, Simone Brugiapaglia, and Tim Hoheisel. LASSO reloaded: a variational analysis perspective with applications to compressed sensing. *SIAM Journal on Mathematics of Data Science*, 5(4):1102–1129, December 2023. CODEN SJMDAQ. ISSN 2577-0187.

Beaglehole:2023:IKR

[BBP23] Daniel Beaglehole, Mikhail Belkin, and Parthe Pandit. On the inconsistency of kernel ridgeless regression in fixed dimensions. *SIAM Journal on Mathematics of Data Science*, 5(4):854–872, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1499819`.

Basu:2024:STD

[BBS24] Sabyasachi Basu, Suman Kalyan Bera, and C. Seshadhri. Spectral triadic decompositions of real-world networks. *SIAM Journal on Mathematics of Data Science*, 6(3):703–730, August 2024. CODEN SJMDAQ. ISSN 2577-0187.

Bercu:2025:SOT

[BBT25] Bernard Bercu, Jérémie Bigot, and Gauthier Thurin. Stochastic optimal transport in Banach spaces for regularized estimation of multivariate quantiles. *SIAM Journal on Mathematics of Data Science*, 7 (4):1664–1689, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1550852`.

Bogensperger:2022:CPS

[BCP22] Lea Bogensperger, Antonin Chambolle, and Thomas Pock. Convergence of a piggyback-style method for the differentiation of solutions of standard saddle-point problems. *SIAM Journal on Mathematics of Data Science*, 4(3):1003–1030, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1455887`.

Bendory:2025:PRS

[BDES25] Tamir Bendory, Nadav Dym, Dan Edidin, and Arun Suresh. Phase retrieval with semialgebraic and ReLU neural network priors. *SIAM Journal on Mathematics of Data Science*, 7(4):1705–1728, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M161731X`.

Birrell:2021:VRN

[BDK+21] Jeremiah Birrell, Paul Dupuis, Markos A. Katsoulakis, Luc Rey-Bellet, and Jie Wang. Variational representations and neural network estimation of Rényi divergences. *SIAM Journal on Mathematics of Data Science*, 3(4):1093–1116, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Boedihardjo:2021:PGS

[BDS21] March Boedihardjo, Shaofeng Deng, and Thomas Strohmer. A performance guarantee for spectral clustering. *SIAM Journal on Mathematics of Data Science*, 3(1):369–387, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Bendory:2020:TMT

[BE20] Tamir Bendory and Dan Edidin. Toward a mathematical theory of the crystallographic phase retrieval problem. *SIAM Journal on Mathematics of Data Science*, 2(3): 809–839, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Bendory:2024:SCS

[BE24] Tamir Bendory and Dan Edidin. The sample complexity of sparse multireference alignment and single-particle cryo-electron microscopy. *SIAM Journal on Mathematics of Data Science*, 6(2):254–282, April 2024. CODEN SJMDAQ. ISSN 2577-0187.

Benson:2019:THE

[Ben19] Austin R. Benson. Three hypergraph eigenvector centralities. *SIAM Journal on Mathematics of Data Science*, 1(2): 293–312, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Boyd:2021:MDG

[BFM+21] Zachary M. Boyd, Nicolas Fraiman, Jeremy Marzuola, Peter J. Mucha, Braxton Osting, and Jonathan Weare. A metric on directed graphs and Markov chains based on hitting probabilities. *SIAM Journal on Mathematics of Data Science*, 3(2):467–493, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Bayer:2023:SDN

[BFT23] Christian Bayer, Peter K. Friz, and Nikolas Tapia. Stability of deep neural networks via discrete rough paths. *SIAM Journal on Mathematics of Data Science*, 5(1):50–76, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1472358`.

Berner:2020:AGE

[BGJ20] Julius Berner, Philipp Grohs, and Arnulf Jentzen. Analysis of the generalization error: Empirical risk minimization over deep artificial neural networks overcomes the curse of dimensionality in the numerical approximation of Black–Scholes partial differential equations. *SIAM Journal on Mathematics of Data Science*, 2(3):631–657, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Bohn:2022:DNN

[BGK22] Bastian Bohn, Michael Griebel, and Dinesh Kannan. Deep neural networks and PIDE discretizations. *SIAM Journal on Mathematics of Data Science*, 4(3):1145–1170, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1438554`.

Bolcskei:2019:OAS

[BGKP19] Helmut Bölcskei, Philipp Grohs, Gitta Kutyniok, and Philipp Petersen. Optimal approximation with sparsely connected deep neural networks. *SIAM Journal on Mathematics of Data Science*, 1(1):8–45, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Bai:2023:EGO

[BGS23] Yatong Bai, Tanmay Gautam, and Somayeh Sojoudi. Efficient global optimization of two-layer ReLU networks: Quadratic-time algorithms and adversarial training. *SIAM Journal on Mathematics of Data Science*, 5(2):446–474, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1467134`.

Bock:2022:SCD

[BH22] Markus Böck and Clemens Heitzinger. Speedy categorical distributional reinforcement learning and complexity analysis. *SIAM Jour-*

nal on Mathematics of Data Science, 4(2):675–693, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/20M1364436`.

Beckmann:2024:ENN

[BH24] Matthias Beckmann and Nick Heilenkötter. Equivariant neural networks for indirect measurements. *SIAM Journal on Mathematics of Data Science*, 6(3):579–601, July 2024. CODEN SJMDAQ. ISSN 2577-0187.

Belkin:2020:TMD

[BHX20] Mikhail Belkin, Daniel Hsu, and Ji Xu. Two models of double descent for weak features. *SIAM Journal on Mathematics of Data Science*, 2(4):1167–1180, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Bayraktar:2023:AQL

[BK23] Erhan Bayraktar and Ali Devran Kara. Approximate Q learning for controlled diffusion processes and its near optimality. *SIAM Journal on Mathematics of Data Science*, 5(3):615–638, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1484201`.

Belyaeva:2022:IGO

[BKSU22] Anastasiya Belyaeva, Kaie Kubjas, Lawrence J. Sun, and Caroline Uhler. Identifying 3D genome organization in diploid organisms via Euclidean distance geometry. *SIAM Journal on Mathematics of Data Science*, 4(1):204–228, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1390372`.

Baykal:2022:SIP

[BLG+22] Cenk Baykal, Lucas Liebenwein, Igor Gilitschenski, Dan Feldman, and Daniela Rus. Sensitivity-informed provable pruning of neural networks. *SIAM Journal on Mathematics of Data Science*, 4(1):26–45, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/20M1383239`.

Bachoc:2022:SCD

[BLLR22] François Bachoc, Andrés F. López-Lopera, and Olivier Roustant. Sequential construction and dimension reduction of Gaussian processes under inequality constraints. *SIAM Journal on Mathematics of Data Science*, 4(2):772–800, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1407513`.

Briend:2025:QRA

[BLO25] Simon Briend, Gábor Lugosi, and Roberto Imbuzeiro Oliveira. On the quality of randomized approximations of Tukey's depth. *SIAM Journal on Mathematics of Data Science*, 7(3):1441–1464, ????

2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1654919.

Breiding:2020:RPA

[BM20] Paul Breiding and Orlando Marigliano. Random points on an algebraic manifold. *SIAM Journal on Mathematics of Data Science*, 2(3):683–704, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Behr:2022:SMM

[BM22] Merle Behr and Axel Munk. Statistical methods for minimax estimation in linear models with unknown design over finite alphabets. *SIAM Journal on Mathematics of Data Science*, 4(2):490–513, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1398860.

Basu:2021:ASE

[BNS21] Amitabh Basu, Tu Nguyen, and Ao Sun. Admissibility of solution estimators for stochastic optimization. *SIAM Journal on Mathematics of Data Science*, 3(1):31–51, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Bauch:2021:RIL

[BNZ21] Jonathan Bauch, Boaz Nadler, and Pini Zilber. Rank $2r$ iterative least squares: Efficient recovery of ill-conditioned low rank matrices from few entries. *SIAM Journal on Mathematics of Data Science*, 3(1):439–465, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Bomze:2022:FCD

[BRZ22] Immanuel M. Bomze, Francesco Rinaldi, and Damiano Zeffiro. Fast cluster detection in networks by first order optimization. *SIAM Journal on Mathematics of Data Science*, 4(1):285–305, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1408658.

Bohm:2022:TST

[BSCB22] Axel Böhm, Michael Sedlmayer, Ernö Robert Csetnek, and Radu Ioan Bot. Two steps at a time — taking GAN training in stride with Tseng's method. *SIAM Journal on Mathematics of Data Science*, 4(2):750–771, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1420939.

Bergermann:2021:SSL

[BSV21] Kai Bergermann, Martin Stoll, and Toni Volkmer. Semi-supervised learning for aggregated multilayer graphs using diffuse interface methods and fast matrix-vector products. *SIAM Journal on Mathematics of Data Science*, 3(2):758–785, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Boedihardjo:2022:PSN

[BSV22] March Boedihardjo, Thomas Strohmer, and Roman Vershynin. Private sampling: A noiseless approach for generating differentially private synthetic data. *SIAM Journal on Mathematics of Data Science*, 4(3):1082–1115, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1449944`.

Barre:2022:CCV

[BTd22] Mathieu Barré, Adrien Taylor, and Alexandre d'Aspremont. Convergence of a constrained vector extrapolation scheme. *SIAM Journal on Mathematics of Data Science*, 4 (3):979–1002, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1428030`.

Budzinskiy:2025:WBD

[Bud25] Stanislav Budzinskiy. When big data actually are low-rank, or entrywise approximation of certain function-generated matrices. *SIAM Journal on Mathematics of Data Science*, 7(3):1098–1122, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1687133`.

Baldi:2019:PTF

[BV19] Pierre Baldi and Roman Vershynin. Polynomial threshold functions, hyperplane arrangements, and random tensors. *SIAM Journal on Mathematics of Data Science*, 1(4):699–729, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Calder:2019:CLL

[Cal19] Jeff Calder. Consistency of Lipschitz learning with infinite unlabeled data and finite labeled data. *SIAM Journal on Mathematics of Data Science*, 1(4): 780–812, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Charisopoulos:2021:CED

[CBD21] Vasileios Charisopoulos, Austin R. Benson, and Anil Damle. Communication-efficient distributed eigenspace estimation. *SIAM Journal on Mathematics of Data Science*, 3(4):1067–1092, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Chambolle:2022:ABP

[CC22] Antonin Chambolle and Juan Pablo Contreras. Accelerated Bregman primal-dual methods applied to optimal transport and Wasserstein barycenter problems. *SIAM Journal on Mathematics of Data Science*, 4 (4):1369–1395, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1481865`.

Chen:2023:TNT

[CCM23] Zaiwei Chen, John-Paul Clarke, and Siva Theja Maguluri. Target network and truncation overcome the deadly triad in Q-learning. *SIAM Journal on Mathematics of Data Science*, 5(4):1078–1101, December 2023. CODEN SJMDAQ. ISSN 2577-0187.

Carvalho:2025:PNT

[CCMO25] Luís Carvalho, João L. Costa, José Mourão, and Gonçalo Oliveira. The positivity of the neural tangent kernel. *SIAM Journal on Mathematics of Data Science*, 7(2):495–515, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1659534`.

Carmona:2023:SOA

[CCNP23] Mikhael Carmona, Victor Chepoi, Guyslain Naves, and Pascal Préa. A simple and optimal algorithm for strict circular seriation. *SIAM Journal on Mathematics of Data Science*, 5(1):201–221, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1495342`.

Cowen:2021:DSD

[CDH+21] Lenore Cowen, Kapil Devkota, Xiaozhe Hu, James M. Murphy, and Kaiyi Wu. Diffusion state distances: Multitemporal analysis, fast algorithms, and applications to biological networks. *SIAM Journal on Mathematics of Data Science*, 3(1):142–170, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Czaja:2021:TMF

[CDJN21] Wojciech Czaja, Dong Dong, Pierre-Emmanuel Jabin, and Franck Olivier Ndjakou Njeunje. Transport model for feature extraction. *SIAM Journal on Mathematics of Data Science*, 3(1):321–341, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Cipolla:2025:EKP

[CDM25] Stefano Cipolla, Fabio Durastante, and Beatrice Meini. Enforcing Katz and PageRank centrality measures in complex networks. *SIAM Journal on Mathematics of Data Science*, 7(3):1514–1539, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1690849`.

Chen:2023:CSL

[CDS23] Wenyu Chen, Mathias Drton, and Ali Shojaie. Causal structural learning via local graphs. *SIAM Journal on Mathematics of Data Science*, 5(2):280–305, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/20M1362796`.

Conforti:2025:KCG

[CDS25] Giovanni Conforti, Alain Durmus, and Marta Gentiloni Silveri. KL convergence guarantees for score diffusion models under minimal data assumptions. *SIAM Journal* on Mathematics of Data Science, 7(1):86–109, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1613670.

Cayci:2025:CGD

[CE25] Semih Cayci and Atilla Eryilmaz. Convergence of gradient descent for recurrent neural networks: a nonasymptotic analysis. *SIAM Journal on Mathematics of Data Science*, 7(2):826–854, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1642500.

Chodrow:2023:NSC

[CEH23] Philip Chodrow, Nicole Eikmeier, and Jamie Haddock. Nonbacktracking spectral clustering of nonuniform hypergraphs. *SIAM Journal on Mathematics of Data Science*, 5(2):251–279, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M1494713.

Cacciola:2023:DNN

[CFLL23] Matteo Cacciola, Antonio Frangioni, Xinlin Li, and Andrea Lodi. Deep neural networks pruning via the structured perspective regularization. *SIAM Journal on Mathematics of Data Science*, 5 (4):1051–1077, December 2023. CODEN SJMDAQ. ISSN 2577-0187.

Cohen:2019:ICD

[CG19] Jeremy E. Cohen and Nicolas Gillis. Identifiability of complete dictionary learning. *SIAM Journal on Mathematics of Data Science*, 1(3):518–536, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Chodrow:2020:MUR

[Cho20] Philip S. Chodrow. Moments of uniform random multigraphs with fixed degree sequences. *SIAM Journal on Mathematics of Data Science*, 2(4):1034–1065, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Cayci:2024:FTA

[CHS24] Semih Cayci, Niao He, and R. Srikant. Finite-time analysis of natural actor-critic for POMDPs. *SIAM Journal on Mathematics of Data Science*, 6(4):869–896, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1587683.

Chada:2025:BDL

[CJLS25] Neil K. Chada, Ajay Jasra, Kody J. H. Law, and Sumeetpal S. Singh. Bayesian deep learning with multilevel trace-class neural networks. *SIAM Journal on Mathematics of Data Science*, 7(3):1210–1240, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1544738.

Cohen:2025:EAR

[CL25] Jeremy E. Cohen and Valentin Leplat. Efficient algorithms for regularized nonnegative scale-invariant low-rank approximation models. *SIAM Journal on Mathematics of Data Science*, 7(2):468–494, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1657948`.

Chevallier:2022:EWD

[CLLD22] Emmanuel Chevallier, Didong Li, Yulong Lu, and David Dunson. Exponential-wrapped distributions on symmetric spaces. *SIAM Journal on Mathematics of Data Science*, 4(4):1347–1368, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1461551`.

Caragea:2022:QAR

[CLM+22] Andrei Caragea, Dae Gwan Lee, Johannes Maly, Götz Pfander, and Felix Voigtlaender. Quantitative approximation results for complex-valued neural networks. *SIAM Journal on Mathematics of Data Science*, 4(2):553–580, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1429540`.

Cuchiero:2020:DNN

[CLT20] Christa Cuchiero, Martin Larsson, and Josef Teichmann. Deep neural networks, generic universal interpolation, and controlled ODEs. *SIAM Journal on Mathematics of Data Science*, 2(3):901–919, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Chau:2021:SGL

[CMR+21] Ngoc Huy Chau, Éric Moulines, Miklós Rásonyi, Sotirios Sabanis, and Ying Zhang. On stochastic gradient Langevin dynamics with dependent data streams: The fully nonconvex case. *SIAM Journal on Mathematics of Data Science*, 3(3):959–986, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Clum:2020:MCA

[CMS20] Charles Clum, Dustin G. Mixon, and Theresa Scarnati. Matching component analysis for transfer learning. *SIAM Journal on Mathematics of Data Science*, 2(2):309–334, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Cooper:2021:GMO

[Coo21] Yaim Cooper. Global minima of overparameterized neural networks. *SIAM Journal on Mathematics of Data Science*, 3(2):676–691, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Combettes:2020:LCL

[CP20] Patrick L. Combettes and Jean-Christophe Pesquet. Lipschitz certificates for layered network structures driven by averaged activation operators. *SIAM Journal on Mathematics of Data Science*, 2(2):529–557, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Chen:2022:OOT

[CR22] Haolin Chen and Luis Rademacher. Overcomplete order-3 tensor decomposition, blind deconvolution, and Gaussian mixture models. *SIAM Journal on Mathematics of Data Science*, 4(1):336–361, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1399415`.

Chi:2019:RTC

[CS19] Eric C. Chi and Stefan Steinerberger. Recovering trees with convex clustering. *SIAM Journal on Mathematics of Data Science*, 1(3):383–407, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Chen:2022:AEK

[CSAW22] Yuming Chen, Daniel Sanz-Alonso, and Rebecca Willett. Autodifferentiable ensemble Kalman filters. *SIAM Journal on Mathematics of Data Science*, 4(2):801–833, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1434477`.

Cang:2020:PCD

[CW20] Zixuan Cang and Guo-Wei Wei. Persistent cohomology for data with multicomponent heterogeneous information. *SIAM Journal on Mathematics of Data Science*, 2(2): 396–418, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Charisopoulos:2025:NTR

[CW25] Vasileios Charisopoulos and Rebecca Willett. Nonlinear tomographic reconstruction via nonsmooth optimization. *SIAM Journal on Mathematics of Data Science*, 7(2):699–722, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1678982`.

Cang:2025:SGW

[CWZ25] Zixuan Cang, Yaqi Wu, and Yanxiang Zhao. Supervised Gromov–Wasserstein optimal transport with metric-preserving constraints. *SIAM Journal on Mathematics of Data Science*, 7(1):301–328, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1630499`.

Cui:2020:ASN

[CZD+20] Chunfeng Cui, Kaiqi Zhang, Talgat Daulbaev, Julia Gusak, Ivan Oseledets, and Zheng Zhang. Active subspace of neural networks: Structural analysis and universal attacks. *SIAM Journal on Mathematics of Data Science*, 2(4):1096–1122, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Dar:2022:DDD

[DB22] Yehuda Dar and Richard G. Baraniuk. Double double descent: On generalization errors in transfer learning between linear regression tasks. *SIAM Journal on Mathematics of Data Science*, 4(4):1447–1472, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1469559`.

delBarrio:2023:ICL

[dBSLNW23] Eustasio del Barrio, Alberto González Sanz, Jean-Michel Loubes, and Jonathan Niles-Weed. An improved central limit theorem and fast convergence rates for entropic transportation costs. *SIAM Journal on Mathematics of Data Science*, 5(3):639–669, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M149260X`.

DeBortoli:2021:MEM

[DDD+21] Valentin De Bortoli, Agnès Desolneux, Alain Durmus, Bruno Galerne, and Arthur Leclaire. Maximum entropy methods for texture synthesis: Theory and practice. *SIAM Journal on Mathematics of Data Science*, 3(1):52–82, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

DeLara:2025:NPF

[DDGSF25] Lucas De Lara, Mathis Deronzier, Alberto González-Sanz, and Virgile Foy. On the nonconvexity of push-forward constraints and its consequences in machine learning. *SIAM Journal on Mathematics of Data Science*, 7(2):597–620, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1645036`.

DeLoera:2020:STT

[DH20] Jesus A. De Loera and Thomas Hogan. Stochastic Tverberg theorems with applications in multiclass logistic regression, separability, and centerpoints of data. *SIAM Journal on Mathematics of Data Science*, 2(4):1151–1166, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

DeZoort:2025:PIA

[DH25] Gage DeZoort and Boris Hanin. Principles for initialization and architecture selection in graph neural networks with ReLU activations. *SIAM Journal on Mathematics of Data Science*, 7(1):1–27, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1600621`.

Delgosha:2022:RCU

[DHP22] Payam Delgosha, Hamed Hassani, and Ramtin Pedarsani. Robust classification under ℓ_0 attack for the Gaussian mixture model. *SIAM Journal on Mathematics of Data Science*, 4(1):362–385, ????

2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1426286.

Drees:2020:MDP

[DJRW20] Holger Drees, Anja Janßen, Sidney I. Resnick, and Tiandong Wang. On a minimum distance procedure for threshold selection in tail analysis. *SIAM Journal on Mathematics of Data Science*, 2(1):75–102, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Duruisseaux:2022:VFA

[DL22] Valentin Duruisseaux and Melvin Leok. A variational formulation of accelerated optimization on Riemannian manifolds. *SIAM Journal on Mathematics of Data Science*, 4(2):649–674, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1395648.

Dar:2024:CIT

[DLB24] Yehuda Dar, Daniel LeJeune, and Richard G. Baraniuk. The common intuition to transfer learning can win or lose: Case studies for linear regression. *SIAM Journal on Mathematics of Data Science*, 6(2):454–480, May 2024. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1563062.

Dubey:2025:MPI

[DLF25] Harsh Vardhan Dubey, Ji Ah Lee, and Patrick Flaherty. Maximum a posteriori inference for factor graphs via Benders' decomposition. *SIAM Journal on Mathematics of Data Science*, 7(3):1394–1421, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1624981.

Dunlap:2022:LVS

[DM22] Alexander Dunlap and Jean-Christophe Mourrat. Local versions of sum-of-norms clustering. *SIAM Journal on Mathematics of Data Science*, 4(4):1250–1271, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1448732.

DaCosta:2025:IKR

[DMOS25] Nathaël Da Costa, Cyrus Mostajeran, Juan-Pablo Ortega, and Salem Said. Invariant kernels on Riemannian symmetric spaces: a harmonic-analytic approach. *SIAM Journal on Mathematics of Data Science*, 7(2):752–776, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1613566.

Doan:2021:FTP

[DMR21] Thinh T. Doan, Siva Theja Maguluri, and Justin Romberg.

Finite-time performance of distributed temporal-difference learning with linear function approximation. *SIAM Journal on Mathematics of Data Science*, 3(1):298–320, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Dirksen:2022:SER

[DMS22] Sjoerd Dirksen, Shahar Mendelson, and Alexander Stollenwerk. Sharp estimates on random hyperplane tessellations. *SIAM Journal on Mathematics of Data Science*, 4 (4):1396–1419, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1485826`.

DiLillo:2025:SCD

[DMSV25] Simmaco Di Lillo, Domenico Marinucci, Michele Salvi, and Stefano Vigogna. Spectral complexity of deep neural networks. *SIAM Journal on Mathematics of Data Science*, 7 (3):1154–1183, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1675746`.

Derezinski:2024:SAS

[DR24] Michał Dereziński and Elizaveta Rebrova. Sharp analysis of sketch-and-project methods via a connection to randomized singular value decomposition. *SIAM Journal on Mathematics of Data Science*, 6(1):127–153, February 2024. CODEN SJMDAQ. ISSN 2577-0187.

Dietrich:2022:SDJ

[DYM+22] Felix Dietrich, Or Yair, Rotem Mulayoff, Ronen Talmon, and Ioannis G. Kevrekidis. Spectral discovery of jointly smooth features for multimodal data. *SIAM Journal on Mathematics of Data Science*, 4(1):410–430, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M141590X`.

Ghaoui:2021:IDL

[EGT+21] Laurent El Ghaoui, Fangda Gu, Bertrand Travacca, Armin Askari, and Alicia Tsai. Implicit deep learning. *SIAM Journal on Mathematics of Data Science*, 3(3):930–958, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Elvira:2023:SRI

[EH23] Clément Elvira and Cédric Herzet. Safe rules for the identification of zeros in the solutions of the SLOPE problem. *SIAM Journal on Mathematics of Data Science*, 5(1):147–173, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1457631`.

ElAlaoui:2019:DPD

[ERK+19] Ahmed El Alaoui, Aaditya Ramdas, Florent Krzakala, Lenka Zdeborová, and Michael I. Jordan. Decoding from pooled data: Sharp information-theoretic bounds. *SIAM Journal on Mathematics of Data Science*, 1(1):161–188, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Etter:2022:OSG

[EY22] Philip A. Etter and Lexing Ying. Operator shifting for general noisy matrix systems. *SIAM Journal on Mathematics of Data Science*, 4(4):1320–1346, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1416849`.

Fabiani:2025:RPN

[Fab25] Gianluca Fabiani. Random projection neural networks of best approximation: Convergence theory and practical applications. *SIAM Journal on Mathematics of Data Science*, 7(2):385–409, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1639890`.

Fanuel:2022:PSD

[FADS22] Michaël Fanuel, Antoine Aspeel, Jean-Charles Delvenne, and Johan A. K. Suykens. Positive semi-definite embedding for dimensionality reduction and out-of-sample extensions. *SIAM Journal on Mathematics of Data Science*, 4(1):153–178, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/20M1370653`.

Feldman:2025:SPE

[Fel25] Michael J. Feldman. Spectral properties of elementwise-transformed spiked matrices. *SIAM Journal on Mathematics of Data Science*, 7(2):542–571, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1627985`.

Fefferman:2020:RRM

[FILN20] Charles Fefferman, Sergei Ivanov, Matti Lassas, and Hariharan Narayanan. Reconstruction of a Riemannian manifold from noisy intrinsic distances. *SIAM Journal on Mathematics of Data Science*, 2(3):770–808, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Fan:2022:JCD

[FKZ22] Yifeng Fan, Yuehaw Khoo, and Zhizhen Zhao. Joint community detection and rotational synchronization via semidefinite programming. *SIAM Journal on Mathematics of Data Science*, 4(3):1052–1081, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1419702`.

Filipovic:2025:AJD

[FMS25] Damir Filipović, Michael D. Multerer, and Paul Schneider. Adaptive joint distribution learning. *SIAM Journal* on Mathematics of Data Science, 7(1):28–54, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1629900.

Friesecke:2023:GAH

[FP23] Gero Friesecke and Maximilian Penka. The GenCol algorithm for high-dimensional optimal transport: General formulation and application to barycenters and Wasserstein splines. *SIAM Journal on Mathematics of Data Science*, 5(4):899–919, October 2023. CODEN SJMDAQ. ISSN 2577-0187.

Frangella:2024:SRS

[FRZU24] Zachary Frangella, Pratik Rathore, Shipu Zhao, and Madeleine Udell. SketchySGD: Reliable stochastic optimization via randomized curvature estimates. *SIAM Journal on Mathematics of Data Science*, 6(4):1173–1204, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1575330.

Fanuel:2021:DSI

[FSS21] Michael Fanuel, Joachim Schreurs, and Johan Suykens. Diversity sampling is an implicit regularization for kernel methods. *SIAM Journal on Mathematics of Data Science*, 3(1):280–297, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Fanuel:2022:DPP

[FSS22] Michaël Fanuel, Joachim Schreurs, and Johan A. K. Suykens. Determinantal point processes implicitly regularize semiparametric regression problems. *SIAM Journal on Mathematics of Data Science*, 4(3):1171–1190, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1403977.

Fasino:2020:ECH

[FT20] Dario Fasino and Francesco Tudisco. Ergodicity coefficients for higher-order stochastic processes. *SIAM Journal on Mathematics of Data Science*, 2(3):740–769, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Farnia:2023:GGG

[FWDJ23] Farzan Farnia, William W. Wang, Subhro Das, and Ali Jadbabaie. GAT-GMM: Generative adversarial training for Gaussian mixture models. *SIAM Journal on Mathematics of Data Science*, 5(1):122–146, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1445831.

Ghosh:2023:UTB

[GB23] Nikhil Ghosh and Mikhail Belkin. A universal trade-off between the model size, test loss, and training loss of linear predictors. *SIAM Journal* *on Mathematics of Data Science*, 5(4):977–1004, November 2023. CODEN SJMDAQ. ISSN 2577-0187.

Gu:2024:LRG

[GBP+24] Hyemin Gu, Panagiota Birmpa, Yannis Pantazis, Luc Rey-Bellet, and Markos A. Katsoulakis. Lipschitz-regularized gradient flows and generative particle algorithms for high-dimensional scarce data. *SIAM Journal on Mathematics of Data Science*, 6(4):1205–1235, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1587841`.

Gupta:2020:SLP

[GCPT20] Abhishek Gupta, Hao Chen, Jianzong Pi, and Gaurav Tendolkar. Some limit properties of Markov chains induced by recursive stochastic algorithms. *SIAM Journal on Mathematics of Data Science*, 2(4):967–1003, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Guo:2025:RTM

[GD25] Erdong Guo and David Draper. Representation theorems for matrix product states. *SIAM Journal on Mathematics of Data Science*, 7(4):1690–1704, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M172010X`.

Gu:2021:MFC

[GGWX21] Haotian Gu, Xin Guo, Xiaoli Wei, and Renyuan Xu. Mean-field controls with Q-learning for cooperative MARL: Convergence and complexity analysis. *SIAM Journal on Mathematics of Data Science*, 3(4):1168–1196, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Gupta:2021:CRS

[GH21] Abhishek Gupta and William B. Haskell. Convergence of recursive stochastic algorithms using Wasserstein divergence. *SIAM Journal on Mathematics of Data Science*, 3(4):1141–1167, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Gidisu:2022:GCD

[GH22] Perfect Y. Gidisu and Michiel E. Hochstenbach. A generalized CUR decomposition for matrix pairs. *SIAM Journal on Mathematics of Data Science*, 4(1):386–409, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1432119`.

Gelss:2024:FIE

[GIK24] Patrick Gelß, Aizhan Issagali, and Ralf Kornhuber. Fredholm integral equations for function approximation and the training of neural networks. *SIAM Journal on Mathematics of Data Science*, 6(4):1078–1108, ???? 2024. CODEN SJMDAQ.

ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M156642X.

Grishchenko:2021:DLS

[GIMA21] Dmitry Grishchenko, Franck Iutzeler, Jérôme Malick, and Massih-Reza Amini. Distributed learning with sparse communications by identification. *SIAM Journal on Mathematics of Data Science*, 3(2): 715–735, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Gheissari:2025:FPC

[GJX25] Reza Gheissari, Aukosh Jagannath, and Yiming Xu. Finding planted cliques using gradient descent. *SIAM Journal on Mathematics of Data Science*, 7(2):643–669, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1680489.

Gao:2019:GPLb

[GKBD19] Tingran Gao, Shahar Z. Kovalsky, Doug M. Boyer, and Ingrid Daubechies. Gaussian process landmarking for three-dimensional geometric morphometrics. *SIAM Journal on Mathematics of Data Science*, 1(1):237–267, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Gao:2019:GPLa

[GKD19] Tingran Gao, Shahar Z. Kovalsky, and Ingrid Daubechies. Gaussian process landmarking on manifolds. *SIAM Journal on Mathematics of Data Science*, 1(1):208–236, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Gao:2023:APD

[GNZ23] Yihang Gao, Michael K. Ng, and Mingjie Zhou. Approximating probability distributions by using Wasserstein generative adversarial networks. *SIAM Journal on Mathematics of Data Science*, 5(4):949–976, November 2023. CODEN SJMDAQ. ISSN 2577-0187.

Gilbert:2025:CPM

[GO25] Anna C. Gilbert and Kevin O'Neill. CA-PCA: Manifold dimension estimation, adapted for curvature. *SIAM Journal on Mathematics of Data Science*, 7(1):355–383, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1575135.

Gossmann:2021:TDR

[GPWS21] Alexej Gossmann, Aria Pezeshk, Yu-Ping Wang, and Berkman Sahiner. Test data reuse for the evaluation of continuously evolving classification algorithms using the area under the receiver operating characteristic curve. *SIAM Journal on Mathematics of Data Science*, 3(2):692–714, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Gunther:2020:LPT

[GRS+20] Stefanie Günther, Lars Ruthotto, Jacob B. Schroder, Eric C. Cyr, and Nicolas R. Gauger. Layer-parallel training of deep residual neural networks. *SIAM Journal on Mathematics of Data Science*, 2(1):1–23, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Gerbelot:2024:RDM

[GTM+24] Cédric Gerbelot, Emanuele Troiani, Francesca Mignacco, Florent Krzakala, and Lenka Zdeborová. Rigorous dynamical mean-field theory for stochastic gradient descent methods. *SIAM Journal on Mathematics of Data Science*, 6(2):400–427, May 2024. CODEN SJMDAQ. ISSN 2577-0187.

Hofmann:2025:PMP

[HB25] S. Hofmann and A. Borzì. The Pontryagin maximum principle for training convolutional neural networks. *SIAM Journal on Mathematics of Data Science*, 7(4):1616–1642, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1675369`.

Hertrich:2024:FKS

[Her24] Johannes Hertrich. Fast kernel summation in high dimensions via slicing and Fourier transforms. *SIAM Journal on Mathematics of Data Science*, 6(4):1109–1137, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1632085`.

Haber:2023:EPA

[HET23] Eldad Haber, Moshe Eliasof, and Luis Tenorio. Estimating a potential without the agony of the partition function. *SIAM Journal on Mathematics of Data Science*, 5(4):1005–1027, November 2023. CODEN SJMDAQ. ISSN 2577-0187.

Heaton:2022:WBP

[HFL+22] Howard Heaton, Samy Wu Fung, Alex Tong Lin, Stanley Osher, and Wotao Yin. Wasserstein-based projections with applications to inverse problems. *SIAM Journal on Mathematics of Data Science*, 4(2):581–603, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/20M1376790`.

Hutchings:2024:EBS

[HG24] Matthew Hutchings and Bertrand Gauthier. Energy-based sequential sampling for low-rank PSD-matrix approximation. *SIAM Journal on Mathematics of Data Science*, 6(4):1055–1077, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M162449X`.

Hur:2024:RGM

[HGL24] YoonHaeng Hur, Wenxuan Guo, and Tengyuan Liang. Reversible Gromov–Monge sampler for simulation-based inference. *SIAM Journal on Mathematics of Data Science*, 6(2): 283–310, April 2024. CODEN SJMDAQ. ISSN 2577-0187.

Habring:2022:GVM

[HH22] Andreas Habring and Martin Holler. A generative variational model for inverse problems in imaging. *SIAM Journal on Mathematics of Data Science*, 4(1):306–335, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1414978`.

Habring:2023:NRI

[HH23] Andreas Habring and Martin Holler. A note on the regularity of images generated by convolutional neural networks. *SIAM Journal on Mathematics of Data Science*, 5(3):670–692, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1525995`.

Hamm:2023:WWI

[HHK23] Keaton Hamm, Nick Henscheid, and Shujie Kang. Wassmap: Wasserstein isometric mapping for image manifold learning. *SIAM Journal on Mathematics of Data Science*, 5(2):475–501, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1490053`.

Habring:2024:SLM

[HHP24] Andreas Habring, Martin Holler, and Thomas Pock. Subgradient Langevin methods for sampling from nonsmooth potentials. *SIAM Journal on Mathematics of Data Science*, 6(4):897–925, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1591451`.

Huang:2022:DRR

[HHV22] Ningyuan Teresa Huang, David W. Hogg, and Soledad Villar. Dimensionality reduction, regularization, and generalization in overparameterized regressions. *SIAM Journal on Mathematics of Data Science*, 4(1):126–152, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/20M1387821`.

Hanik:2022:BID

[HHvT22] Martin Hanik, Hans-Christian Hege, and Christoph von Tycowicz. Bi-invariant dissimilarity measures for sample distributions in Lie groups. *SIAM Journal on Mathematics of Data Science*, 4(4):1223–1249, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1410373`.

Hien:2025:BMM

[HLG25] Le Thi Khanh Hien, Valentin Leplat, and Nicolas Gillis. Block majorization minimization with extrapolation and application to β-NMF. *SIAM Journal on Mathematics of Data Science*, 7(3):1292–1314, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1660188.

Horvath:2022:ASG

[HLRJ22] Samuel Horváth, Lihua Lei, Peter Richtárik, and Michael I. Jordan. Adaptivity of stochastic gradient methods for nonconvex optimization. *SIAM Journal on Mathematics of Data Science*, 4(2):634–648, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1394308.

Hou:2020:AAE

[HLZ20] Thomas Y. Hou, Zhenzhen Li, and Ziyun Zhang. Analysis of asymptotic escape of strict saddle sets in manifold optimization. *SIAM Journal on Mathematics of Data Science*, 2(3):840–871, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Hawkins:2022:TCN

[HLZ22] Cole Hawkins, Xing Liu, and Zheng Zhang. Towards compact neural networks via end-to-end training: a Bayesian tensor approach with automatic rank determination. *SIAM Journal on Mathematics of Data Science*, 4(1):46–71, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1391444.

Haddock:2021:GWI

[HM21] Jamie Haddock and Anna Ma. Greed works: an improved analysis of sampling Kaczmarz–Motzkin. *SIAM Journal on Mathematics of Data Science*, 3(1):342–368, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Hagemann:2025:MDI

[HMR+25] Paul Hagemann, Sophie Mildenberger, Lars Ruthotto, Gabriele Steidl, and Nicole Tianjiao Yang. Multilevel diffusion: Infinite dimensional score-based diffusion models for image generation. *SIAM Journal on Mathematics of Data Science*, 7(3):1337–1366, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1614092.

Heinemann:2022:RWB

[HMZ22] Florian Heinemann, Axel Munk, and Yoav Zemel. Randomized Wasserstein barycenter computation: Resampling with statistical guarantees. *SIAM Journal on Mathematics of Data Science*, 4(1):229–259, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/20M1385263.

Ho:2019:SSI

[HN19] Nhat Ho and XuanLong Nguyen. Singularity structures and impacts on parameter estimation in finite mixtures of distributions. *SIAM Journal on Mathematics of Data Science*, 1(4):730–758, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Hickok:2022:ASS

[HNP22] Abigail Hickok, Deanna Needell, and Mason A. Porter. Analysis of spatial and spatiotemporal anomalies using persistent homology: Case studies with COVID-19 data. *SIAM Journal on Mathematics of Data Science*, 4(3):1116–1144, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1435033`.

Hien:2022:BBM

[HPG+22] Le Thi Khanh Hien, Duy Nhat Phan, Nicolas Gillis, Masoud Ahookhosh, and Panagiotis Patrinos. Block Bregman majorization minimization with extrapolation. *SIAM Journal on Mathematics of Data Science*, 4(1):1–25, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1432661`.

Han:2025:CAM

[HRS25] Yanjun Han, Philippe Rigollet, and George Stepaniants. Covariance alignment: From maximum likelihood estimation to Gromov–Wasserstein. *SIAM Journal on Mathematics of Data Science*, 7(3):1491–1513, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1682841`.

Hamm:2022:IDA

[HS22] Thomas Hamm and Ingo Steinwart. Intrinsic dimension adaptive partitioning for kernel methods. *SIAM Journal on Mathematics of Data Science*, 4(2):721–749, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1435690`.

Haldar:2025:NNA

[HS25] Rajdeep Haldar and Qifan Song. On neural network approximation of ideal adversarial attack and convergence of adversarial training. *SIAM Journal on Mathematics of Data Science*, 7(4):1568–1593, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1590512`.

Huguet:2023:TID

[HTR+23] Guillaume Huguet, Alexander Tong, Bastian Rieck, Jessie Huang, Manik Kuchroo, Matthew Hirn, Guy Wolf, and Smita Krishnaswamy. Time-inhomogeneous diffusion geometry and topology. *SIAM Journal on Mathematics of*

Data Science, 5(2):346–372, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1462945`.

Hong:2023:OWP

[HYFB23] David Hong, Fan Yang, Jeffrey A. Fessler, and Laura Balzano. Optimally weighted PCA for high-dimensional heteroscedastic data. *SIAM Journal on Mathematics of Data Science*, 5(1):222–250, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1470244`.

Harris:2021:DTC

[HZ21] Kameron Decker Harris and Yizhe Zhu. Deterministic tensor completion with hypergraph expanders. *SIAM Journal on Mathematics of Data Science*, 3(4):1117–1140, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Jaffe:2021:SNJ

[JAA+21] Ariel Jaffe, Noah Amsel, Yariv Aizenbud, Boaz Nadler, Joseph T. Chang, and Yuval Kluger. Spectral neighbor joining for reconstruction of latent tree models. *SIAM Journal on Mathematics of Data Science*, 3(1):113–141, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Jaquard:2025:RMS

[JABT25] Hugo Jaquard, Pierre-Olivier Amblard, Simon Barthelmé, and Nicolas Tremblay. Random multitype spanning forests for synchronization on sparse graphs. *SIAM Journal on Mathematics of Data Science*, 7(3):1123–1153, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1649563`.

Jia:2022:UGM

[JB22] Junteng Jia and Austin R. Benson. A unifying generative model for graph learning algorithms: Label propagation, graph convolutions, and combinations. *SIAM Journal on Mathematics of Data Science*, 4(1):100–125, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1395351`.

Jiang:2023:OCN

[JC23] Jie Jiang and Xiaojun Chen. Optimality conditions for nonsmooth nonconvex-nonconcave min-max problems and generative adversarial networks. *SIAM Journal on Mathematics of Data Science*, 5(3):693–722, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1482238`.

Jiang:2023:ARM

[JCD23] Liwei Jiang, Yudong Chen, and Lijun Ding. Algorithmic regularization in model-free overparametrized asymmetric matrix factorization.

SIAM Journal on Mathematics of Data Science, 5(3):723–744, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1519833`.

Juditsky:2024:DPE

[JN24] Anatoli Juditsky and Arkadi Nemirovski. On design of polyhedral estimates in linear inverse problems. *SIAM Journal on Mathematics of Data Science*, 6(1):76–96, February 2024. CODEN SJMDAQ. ISSN 2577-0187.

Jeong:2025:SGD

[JNR25] Halyun Jeong, Deanna Needell, and Elizaveta Rebrova. Stochastic gradient descent for streaming linear and rectified linear systems with adversarial corruptions. *SIAM Journal on Mathematics of Data Science*, 7(2):516–541, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1652167`.

Jorgensen:2021:APR

[JS21] Palle Jorgensen and David E. Stewart. Approximation properties of ridge functions and extreme learning machines. *SIAM Journal on Mathematics of Data Science*, 3(3):815–832, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Jelincic:2025:GML

[JTT+25] Andraz Jelincic, Jiajie Tao, William F. Turner, Thomas Cass, James Foster, and Hao Ni. Generative modeling of Lévy area for high order SDE simulation. *SIAM Journal on Mathematics of Data Science*, 7(4):1541–1567, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M161077X`.

Kubal:2025:LCD

[KCR25] Sharvaj Kubal, Christian Campbell, and Elina Robeva. Log-concave density estimation with independent components. *SIAM Journal on Mathematics of Data Science*, 7(3):1465–1490, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1646947`.

Koppel:2024:OMT

[KEB+24] Alec Koppel, Joe Eappen, Sujay Bhatt, Cole Hawkins, and Sumitra Ganesh. Online MCMC thinning with kernelized Stein discrepancy. *SIAM Journal on Mathematics of Data Science*, 6(1):51–75, February 2024. CODEN SJMDAQ. ISSN 2577-0187.

Keriven:2023:EOT

[Ker23] Nicolas Keriven. Entropic optimal transport on random graphs. *SIAM Journal on Mathematics of Data Science*, 5(4):1028–1050, November 2023. CODEN SJMDAQ. ISSN 2577-0187.

Kolda:2020:SGL

[KH20] Tamara G. Kolda and David Hong. Stochastic gradients for large-scale tensor decomposition. *SIAM Journal on Mathematics of Data Science*, 2(4): 1066–1095, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Kim:2024:MAR

[KL24] Seonho Kim and Kiryung Lee. Max-affine regression via first-order methods. *SIAM Journal on Mathematics of Data Science*, 6(2):534–552, June 2024. CODEN SJMDAQ. ISSN 2577-0187.

Kaushik:2024:NEB

[KMDM24] Chiraag Kaushik, Andrew D. McRae, Mark Davenport, and Vidya Muthukumar. New equivalences between interpolation and SVMs: Kernels and structured features. *SIAM Journal on Mathematics of Data Science*, 6(3):761–787, August 2024. CODEN SJMDAQ. ISSN 2577-0187.

Kolda:2019:ISJ

[Kol19] Tamara G. Kolda. Introduction to SIAM Journal on Mathematics of Data Science (SIMODS). *SIAM Journal on Mathematics of Data Science*, 1(1):1–7, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Khamaru:2021:TDL

[KPR+21] Koulik Khamaru, Ashwin Pananjady, Feng Ruan, Martin J. Wainwright, and Michael I. Jordan. Is temporal difference learning optimal? An instance-dependent analysis. *SIAM Journal on Mathematics of Data Science*, 3(4):1013–1040, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Kim:2024:OMG

[KSAY24] Hwanwoo Kim, Daniel Sanz-Alonso, and Ruiyi Yang. Optimization on manifolds via graph Gaussian processes. *SIAM Journal on Mathematics of Data Science*, 6(1):1–25, February 2024. CODEN SJMDAQ. ISSN 2577-0187.

Klebanov:2020:RTC

[KSS20] Ilja Klebanov, Ingmar Schuster, and T. J. Sullivan. A rigorous theory of conditional mean embeddings. *SIAM Journal on Mathematics of Data Science*, 2(3):583–606, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Kueng:2021:BCD

[KT21] Richard Kueng and Joel A. Tropp. Binary component decomposition. Part I: The positive-semidefinite case. *SIAM Journal on Mathematics of Data Science*, 3(2):544–572, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Klatt:2020:ERO

[KTM20] Marcel Klatt, Carla Tameling, and Axel Munk. Empirical regularized optimal transport:

Statistical theory and applications. *SIAM Journal on Mathematics of Data Science*, 2(2): 419–443, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Kurlin:2025:CCI

[Kur25] Vitaliy A. Kurlin. Complete and continuous invariants of 1-periodic sequences in polynomial time. *SIAM Journal on Mathematics of Data Science*, 7(4):1643–1663, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/25M1733574.

Kuo:2020:GSS

[KZLW20] Han-Wen Kuo, Yuqian Zhang, Yenson Lau, and John Wright. Geometry and symmetry in short-and-sparse deconvolution. *SIAM Journal on Mathematics of Data Science*, 2(1): 216–245, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Lindberg:2025:EGM

[LAR25] Julia Lindberg, Carlos Améndola, and Jose Israel Rodriguez. Estimating Gaussian mixtures using sparse polynomial moment systems. *SIAM Journal on Mathematics of Data Science*, 7(1):224–252, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1610082.

Lanzetti:2025:FOC

[LBD25] Nicolas Lanzetti, Saverio Bolognani, and Florian Dörfler. First-order conditions for optimization in the Wasserstein space. *SIAM Journal on Mathematics of Data Science*, 7(1):274–300, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M156687X.

Landa:2023:RIM

[LC23] Boris Landa and Xiuyuan Cheng. Robust inference of manifold density and geometry by doubly stochastic scaling. *SIAM Journal on Mathematics of Data Science*, 5(3):589–614, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M1516968.

Landa:2021:DSN

[LCK21] Boris Landa, Ronald R. Coifman, and Yuval Kluger. Doubly stochastic normalization of the Gaussian kernel is robust to heteroskedastic noise. *SIAM Journal on Mathematics of Data Science*, 3(1):388–413, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Leeb:2021:MDW

[Lee21] William E. Leeb. Matrix denoising for weighted loss functions and heterogeneous signals. *SIAM Journal on Mathematics of Data Science*, 3(3): 987–1012, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Liu:2025:KBR

[LGL25] Jiamin Liu, Junzhuo Gao, and Heng Lian. Kernel-based regularized learning with random projections: Beyond least squares. *SIAM Journal on Mathematics of Data Science*, 7(1):253–273, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1602954.

Li:2021:GEM

[Li21] Weilin Li. Generalization error of minimum weighted norm and kernel interpolation. *SIAM Journal on Mathematics of Data Science*, 3(1):414–438, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Liu:2024:NBA

[LJWH24] Changyu Liu, Yuling Jiao, Junhui Wang, and Jian Huang. Nonasymptotic bounds for adversarial excess risk under misspecified models. *SIAM Journal on Mathematics of Data Science*, 6(4):847–868, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1598210.

Li:2021:MGM

[LKA+21] Qunwei Li, Bhavya Kailkhura, Rushil Anirudh, Jize Zhang, Yi Zhou, Yingbin Liang, T. Yong-Jin Han, and Pramod K. Varshney. MR-AN: Manifold regularized generative adversarial networks for scientific data. *SIAM Journal on Mathematics of Data Science*, 3(4): 1197–1222, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Landolfi:2024:ODG

[LL24a] Nicholas C. Landolfi and Sanjay Lall. Optimal Dorfman group testing for symmetric distributions. *SIAM Journal on Mathematics of Data Science*, 6(3):731–760, August 2024. CODEN SJMDAQ. ISSN 2577-0187.

Liu:2024:LFV

[LL24b] Hao Liu and Wenjing Liao. Learning functions varying along a central subspace. *SIAM Journal on Mathematics of Data Science*, 6(2):343–371, April 2024. CODEN SJMDAQ. ISSN 2577-0187.

Li:2022:DCO

[LLC22] Boyue Li, Zhize Li, and Yuejie Chi. DESTRESS: Computation-optimal and communication-efficient decentralized nonconvex finite-sum optimization. *SIAM Journal on Mathematics of Data Science*, 4 (3):1031–1051, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1450677.

Li:2022:NWD

[LLM22] Yuqing Li, Tao Luo, and Chao Ma. Nonlinear weighted directed acyclic graph and a priori estimates for neural networks. *SIAM Journal on Mathematics of Data Science*, 4(2):694–720, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M140955X`.

Li:2023:AIO

[LLP23] Tianjiao Li, Guanghui Lan, and Ashwin Pananjady. Accelerated and instance-optimal policy evaluation with linear function approximation. *SIAM Journal on Mathematics of Data Science*, 5(1):174–200, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1468668`.

Lee:2025:EDR

[LLP+25] Andrew Lee, Harlin Lee, Jose A. Perea, Nikolas Schonsheck, and Madeleine Weinstein. $O(k)$-equivariant dimensionality reduction on Stiefel manifolds. *SIAM Journal on Mathematics of Data Science*, 7(2):410–437, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1603443`.

Lovas:2023:TNN

[LLRS23] Attila Lovas, Iosif Lytras, Miklós Rásonyi, and Sotirios Sabanis. Taming neural networks with TUSLA: Nonconvex learning via adaptive stochastic gradient Langevin algorithms. *SIAM Journal on Mathematics of Data Science*, 5(2):323–345, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1514283`.

Lai:2020:CSC

[LM20] Ming-Jun Lai and Daniel Mckenzie. Compressive sensing for cut improvement and local clustering. *SIAM Journal on Mathematics of Data Science*, 2(2):368–395, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Liao:2025:SBS

[LM25] Yulei Liao and Pingbing Ming. Spectral Barron space for deep neural network approximation. *SIAM Journal on Mathematics of Data Science*, 7 (3):1053–1076, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1598738`.

Little:2022:BGD

[LMM22] Anna Little, Daniel McKenzie, and James M. Murphy. Balancing geometry and density: Path distances on high-dimensional data. *SIAM Journal on Mathematics of Data Science*, 4(1):72–99, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/20M1386657`.

Li:2020:GBR

[LMR+20] Yuan Li, Benjamin Mark, Garvesh Raskutti, Rebecca Willett, Hyebin Song, and David Neiman. Graph-based regularization for regression problems with alignment and highly correlated designs. *SIAM Journal on Mathematics of Data Science*, 2(2):480–504, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Luo:2022:ECL

[LMXZ22] Tao Luo, Zheng Ma, Zhi-Qin John Xu, and Yaoyu Zhang. On the exact computation of linear frequency principle dynamics and its generalization. *SIAM Journal on Mathematics of Data Science*, 4(4):1272–1292, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1444400`.

Li:2023:MOR

[LPH+23] Adam Li, Ronan Perry, Chester Huynh, Tyler M. Tomita, Ronak Mehta, Jesus Arroyo, Jesse Patsolic, Ben Falk, Sridevi Sarma, and Joshua Vogelstein. Manifold oblique random forests: Towards closing the gap on convolutional deep networks. *SIAM Journal on Mathematics of Data Science*, 5(1):77–96, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1449117`.

LeJeune:2024:ASP

[LPJ+24] Daniel LeJeune, Pratik Patil, Hamid Javadi, Richard G. Baraniuk, and Ryan J. Tibshirani. Asymptotics of the sketched pseudoinverse. *SIAM Journal on Mathematics of Data Science*, 6(1):199–225, March 2024. CODEN SJMDAQ. ISSN 2577-0187.

Liu:2025:IEL

[LQLS25] Chaoyu Liu, Zhonghua Qiao, Chao Li, and Carola-Bibiane Schönlieb. Inverse evolution layers: Physics-informed regularizers for image segmentation. *SIAM Journal on Mathematics of Data Science*, 7(1):55–85, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1633662`.

Lee:2019:LFD

[LR19] Jaeho Lee and Maxim Raginsky. Learning finite-dimensional coding schemes with nonlinear reconstruction maps. *SIAM Journal on Mathematics of Data Science*, 1(3):617–642, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Linderman:2019:CSP

[LS19] George C. Linderman and Stefan Steinerberger. Clustering with *t*-SNE, provably. *SIAM Journal on Mathematics of Data Science*, 1(2):313–332, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Lee:2023:RIA

[LS23] Kiryung Lee and Dominik Stöger. Randomly initialized alternating least squares: Fast convergence for matrix sensing. *SIAM Journal on Mathematics of Data Science*, 5(3):774–799, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1506456`.

Luke:2019:OSM

[LST19] D. Russell Luke, Shoham Sabach, and Marc Teboulle. Optimization on spheres: Models and proximal algorithms with computational performance comparisons. *SIAM Journal on Mathematics of Data Science*, 1(3):408–445, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Lopes:2020:MAC

[LWL20] Miles E. Lopes, Suofei Wu, and Thomas C. M. Lee. Measuring the algorithmic convergence of randomized ensembles: The regression setting. *SIAM Journal on Mathematics of Data Science*, 2(4):921–943, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Lee:2025:MGM

[LYZL25] Wonjun Lee, Yifei Yang, Dongmian Zou, and Gilad Lerman. Monotone generative modeling via a Gromov–Monge embedding. *SIAM Journal on Mathematics of Data Science*, 7(3):1184–1209, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1673772`.

Liang:2025:SAM

[LZFZ25] Geyu Liang, Gavin Zhang, Salar Fattahi, and Richard Y. Zhang. Simple alternating minimization provably solves complete dictionary learning. *SIAM Journal on Mathematics of Data Science*, 7(3):855–883, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1568120`.

Landa:2022:BRR

[LZK22] Boris Landa, Thomas T. C. K. Zhang, and Yuval Kluger. Biwhitening reveals the rank of a count matrix. *SIAM Journal on Mathematics of Data Science*, 4(4):1420–1446, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1456807`.

Maurais:2025:MCE

[MAPM25] Aimee Maurais, Terrence Alsup, Benjamin Peherstorfer, and Youssef M. Marzouk. Multifidelity covariance estimation via regression on the manifold of symmetric positive definite matrices. *SIAM Journal on Mathematics of Data Science*, 7(1):189–223, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M159247X`.

Miller:2023:PRL

[MC23] Kevin Miller and Jeff Calder. Poisson reweighted Laplacian uncertainty sampling for graph-based active learning. *SIAM Journal on Mathematics of Data Science*, 5(4):1160–1190, December 2023. CODEN SJMDAQ. ISSN 2577-0187.

Montanelli:2019:NEB

[MD19] Hadrien Montanelli and Qiang Du. New error bounds for deep ReLU networks using sparse grids. *SIAM Journal on Mathematics of Data Science*, 1(1): 78–92, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Medina:2025:IKP

[MDS25] Marco Avella Medina, Richard A. Davis, and Gennady Samorodnitsky. Insights into kernel PCA with application to multivariate extremes. *SIAM Journal on Mathematics of Data Science*, 7(2):777–801, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1678635.

Molina-Fructuoso:2022:TDH

[MFM22] Martin Molina-Fructuoso and Ryan Murray. Tukey depths and Hamilton–Jacobi differential equations. *SIAM Journal on Mathematics of Data Science*, 4(2):604–633, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1411998.

Marchand:2021:ANP

[MGHV21] Melissa Marchand, Kyle Gallivan, Wen Huang, and Paul Van Dooren. Analysis of the neighborhood pattern similarity measure for the role extraction problem. *SIAM Journal on Mathematics of Data Science*, 3(2):736–757, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

McKenzie:2024:TOS

[MHL+24] D. McKenzie, H. Heaton, Q. Li, S. Wu Fung, S. Osher, and W. Yin. Three-operator splitting for learning to predict equilibria in convex games. *SIAM Journal on Mathematics of Data Science*, 6(3):627–648, July 2024. CODEN SJMDAQ. ISSN 2577-0187.

Mou:2024:DPP

[MHW+24] Wenlong Mou, Nhat Ho, Martin Wainwright, Peter Bartlett, and Michael Jordan. A diffusion process perspective on posterior contraction rates for parameters. *SIAM Journal on Mathematics of Data Science*, 6(2):553–577, June 2024. CODEN SJMDAQ. ISSN 2577-0187.

Maskey:2025:GBM

[MKL25] Sohir Maskey, Gitta Kutyniok, and Ron Levie. Generalization bounds for message passing networks on mixture of graphons. *SIAM Journal on Mathematics of Data Science*, 7(2):802–825, ????

2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1651526.

Malgouyres:2019:MCS

[ML19] François Malgouyres and Joseph Landsberg. Multilinear compressive sensing and an application to convolutional linear networks. *SIAM Journal on Mathematics of Data Science*, 1(3):446–475, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Meunier:2025:NML

[MLGK25] Dimitri Meunier, Zhu Li, Arthur Gretton, and Samory Kpotufe. Nonlinear meta-learning can guarantee faster rates. *SIAM Journal on Mathematics of Data Science*, 7(4):1594–1615, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1662977.

Mordant:2023:SAR

[MM23] Gilles Mordant and Axel Munk. Statistical analysis of random objects via metric measure Laplacians. *SIAM Journal on Mathematics of Data Science*, 5(2):528–557, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M1491022.

Mimouni:2024:CWB

[MMZdO24] Daniel W. Mimouni, Paul Malisani, Jiamin Zhu, and Welington de Oliveira. Computing Wasserstein barycenters via operator splitting: The method of averaged marginals. *SIAM Journal on Mathematics of Data Science*, 6(4):1000–1026, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1584228.

Maroulas:2020:BFP

[MNO20] Vasileios Maroulas, Farzana Nasrin, and Christopher Oballe. A Bayesian framework for persistent homology. *SIAM Journal on Mathematics of Data Science*, 2(1):48–74, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Minsker:2024:RTF

[MNW24] Stanislav Minsker, Mohamed Ndaoud, and Lang Wang. Robust and tuning-free sparse linear regression via square-root slope. *SIAM Journal on Mathematics of Data Science*, 6(2):428–453, May 2024. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1608690.

Mukkamala:2020:CCB

[MOPS20] Mahesh Chandra Mukkamala, Peter Ochs, Thomas Pock, and Shoham Sabach. Convex-concave backtracking for inertial Bregman proximal gradient algorithms in nonconvex optimization. *SIAM Journal* *on Mathematics of Data Science*, 2(3):658–682, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Mazumdar:2020:GBL

[MRS20] Eric Mazumdar, Lillian J. Ratliff, and S. Shankar Sastry. On gradient-based learning in continuous games. *SIAM Journal on Mathematics of Data Science*, 2(1):103–131, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Muthukumar:2023:ARS

[MS23] Ramchandran Muthukumar and Jeremias Sulam. Adversarial robustness of sparse local Lipschitz predictors. *SIAM Journal on Mathematics of Data Science*, 5(4):920–948, October 2023. CODEN SJMDAQ. ISSN 2577-0187.

Minsker:2024:GMA

[MS24] Stanislav Minsker and Nate Strawn. The geometric median and applications to robust mean estimation. *SIAM Journal on Mathematics of Data Science*, 6(2):504–533, June 2024. CODEN SJMDAQ. ISSN 2577-0187.

Minster:2020:RAL

[MSK20] Rachel Minster, Arvind K. Saibaba, and Misha E. Kilmer. Randomized algorithms for low-rank tensor decompositions in the Tucker format. *SIAM Journal on Mathematics of Data Science*, 2(1):189–215, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Madden:2024:MCT

[MT24] Liam Madden and Christos Thrampoulidis. Memory capacity of two layer neural networks with smooth activations. *SIAM Journal on Mathematics of Data Science*, 6(3):679–702, July 2024. CODEN SJMDAQ. ISSN 2577-0187.

Martin-Urcelay:2025:OMT

[MURB25] Belen Martin-Urcelay, Christopher J. Rozell, and Matthieu R. Bloch. Online machine teaching under learner uncertainty: Gradient descent learners of a quadratic loss. *SIAM Journal on Mathematics of Data Science*, 7(3):884–905, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1657997`.

Maire:2022:MKL

[MV22] Florian Maire and Pierre Vandekerkhove. Markov kernels local aggregation for noise vanishing distribution sampling. *SIAM Journal on Mathematics of Data Science*, 4(4):1293–1319, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1469626`.

Memoli:2022:PLP

[MWW22] Facundo Mémoli, Zhengchao Wan, and Yusu Wang. Persistent Laplacians: Properties, algorithms and implications. *SIAM Journal on Mathematics of Data Science*, 4(2):858–884, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1435471.

Neumayer:2023:ALF

[NGBU23] Sebastian Neumayer, Alexis Goujon, Pakshal Bohra, and Michael Unser. Approximation of Lipschitz functions using deep spline neural networks. *SIAM Journal on Mathematics of Data Science*, 5(2):306–322, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M1504573.

Nikolakakis:2025:SFA

[NKK25] Konstantinos E. Nikolakakis, Amin Karbasi, and Dionysis Kalogerias. Select without fear: Almost all minibatch schedules generalize optimally. *SIAM Journal on Mathematics of Data Science*, 7(3):965–992, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1617096.

Negrini:2024:ANC

[NN24] Elisa Negrini and Levon Nurbekyan. Applications of no-collision transportation maps in manifold learning. *SIAM Journal on Mathematics of Data Science*, 6(1):97–126, February 2024. CODEN SJMDAQ. ISSN 2577-0187.

Neacsu:2024:ANN

[NPVB24] Ana Neacşu, Jean-Christophe Pesquet, Vlad Vasilescu, and Corneliu Burileanu. ABBA neural networks: Coping with positivity, expressivity, and robustness. *SIAM Journal on Mathematics of Data Science*, 6(3):649–678, July 2024. CODEN SJMDAQ. ISSN 2577-0187.

Newman:2021:TLV

[NRHvBW21] Elizabeth Newman, Lars Ruthotto, Joseph Hart, and Bart van Bloemen Waanders. Train like a (var)Pro: Efficient training of neural networks with variable projection. *SIAM Journal on Mathematics of Data Science*, 3(4):1041–1066, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Ongie:2021:TMN

[OPAB+21] Greg Ongie, Daniel Pimentel-Alarcón, Laura Balzano, Rebecca Willett, and Robert D. Nowak. Tensor methods for nonlinear matrix completion. *SIAM Journal on Mathematics of Data Science*, 3(1):253–279, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

OReilly:2022:SGG

[OT22] Eliza O'Reilly and Ngoc Mai Tran. Stochastic geometry to generalize the Mondrian process. *SIAM Journal on Mathematics of Data Science*, 4(2):531–552, ???? 2022. CODEN SJMDAQ.

ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/20M1354490`.

Osting:2021:CAA

[OWXZ21] Braxton Osting, Dong Wang, Yiming Xu, and Dominique Zosso. Consistency of archetypal analysis. *SIAM Journal on Mathematics of Data Science*, 3(1):1–30, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Patel:2024:GDA

[PB24] Vivak Patel and Albert S. Berahas. Gradient descent in the absence of global Lipschitz continuity of the gradients. *SIAM Journal on Mathematics of Data Science*, 6(3): 602–626, July 2024. CODEN SJMDAQ. ISSN 2577-0187.

Phan:2024:SVR

[PBGP24] Duy Nhat Phan, Sedi Bartz, Nilabja Guha, and Hung M. Phan. Stochastic variance-reduced majorization–minimization algorithms. *SIAM Journal on Mathematics of Data Science*, 6(4):926–952, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1571836`.

Persson:2025:RNA

[PBK25] David Persson, Nicolas Boullé, and Daniel Kressner. Randomized Nyström approximation of non-negative self-adjoint operators. *SIAM Journal on Mathematics of Data Science*, 7(2):670–698, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M165082X`.

Pandey:2025:DMM

[PHBO25] Biraj Pandey, Bamdad Hosseini, Pau Batlle, and Houman Owhadi. Diffeomorphic measure matching with kernels for generative modeling. *SIAM Journal on Mathematics of Data Science*, 7(3):937–964, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1642202`.

Pamfil:2019:RMM

[PHLP19] A. Roxana Pamfil, Sam D. Howison, Renaud Lambiotte, and Mason A. Porter. Relating modularity maximization and stochastic block models in multilayer networks. *SIAM Journal on Mathematics of Data Science*, 1(4):667–698, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Parhi:2022:WKF

[PN22] Rahul Parhi and Robert D. Nowak. What kinds of functions do deep neural networks learn? Insights from variational spline theory. *SIAM Journal on Mathematics of Data Science*, 4(2):464–489, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1418642`.

Pooladian:2025:PES

[PNW25] Aram-Alexandre Pooladian and Jonathan Niles-Weed. Plug-in estimation of Schrödinger bridges. *SIAM Journal on Mathematics of Data Science*, 7(3):1315–1336, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1687340`.

Parkinson:2025:RNN

[POW25] Suzanna Parkinson, Greg Ongie, and Rebecca Willett. ReLU neural networks with linear layers are biased towards single- and multi-index models. *SIAM Journal on Mathematics of Data Science*, 7(3):1021–1052, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1672158`.

Parletta:2024:HPB

[PPPS24] Daniela Angela Parletta, Andrea Paudice, Massimiliano Pontil, and Saverio Salzo. High probability bounds for stochastic subgradient schemes with heavy tailed noise. *SIAM Journal on Mathematics of Data Science*, 6(4):953–977, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1536558`.

Potts:2021:IAH

[PS21] Daniel Potts and Michael Schmischke. Interpretable approximation of high-dimensional data. *SIAM Journal on Mathematics of Data Science*, 3(4): 1301–1323, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Perlmutter:2023:UGN

[PTG+23] Michael Perlmutter, Alexander Tong, Feng Gao, Guy Wolf, and Matthew Hirn. Understanding graph neural networks with generalized geometric scattering transforms. *SIAM Journal on Mathematics of Data Science*, 5(4):873–898, October 2023. CODEN SJMDAQ. ISSN 2577-0187.

Parhi:2025:FSO

[PU25] Rahul Parhi and Michael Unser. Function-space optimality of neural architectures with multivariate nonlinearities. *SIAM Journal on Mathematics of Data Science*, 7(1):110–135, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1620971`.

Perry:2019:SCM

[PWB+19] Amelia Perry, Jonathan Weed, Afonso S. Bandeira, Philippe Rigollet, and Amit Singer. The sample complexity of multireference alignment. *SIAM Journal on Mathematics of Data Science*, 1(3):497–517, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Romanov:2021:MRA

[RBO21] Elad Romanov, Tamir Bendory, and Or Ordentlich. Multi-reference alignment in high dimensions: Sample complexity and phase transition. *SIAM Journal on Mathematics of Data Science*, 3(2):494–523, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Reeves:2020:NI

[RDB20] Thomas Reeves, Anil Damle, and Austin R. Benson. Network interpolation. *SIAM Journal on Mathematics of Data Science*, 2(2):505–528, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Riihimaki:2023:SCD

[Rii23] Henri Riihimäki. Simplicial q-connectivity of directed graphs with applications to network analysis. *SIAM Journal on Mathematics of Data Science*, 5(3):800–828, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1480021`.

Roald:2022:AAA

[RSC+22] Marie Roald, Carla Schenker, Vince D. Calhoun, Tülay Adali, Rasmus Bro, Jeremy E. Cohen, and Evrim Acar. An AO-ADMM approach to constraining PARAFAC2 on all modes. *SIAM Journal on Mathematics of Data Science*, 4(3):1191–1222, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1450033`.

Saul:2022:NMD

[Sau22] Lawrence K. Saul. A nonlinear matrix decomposition for mining the zeros of sparse data. *SIAM Journal on Mathematics of Data Science*, 4(2):431–463, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1405769`.

Shnitzer:2019:RHC

[SBCG+19] Tal Shnitzer, Mirela Ben-Chen, Leonidas Guibas, Ronen Talmon, and Hau-Tieng Wu. Recovering hidden components in multimodal data with composite diffusion operators. *SIAM Journal on Mathematics of Data Science*, 1(3):588–616, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Salvi:2021:SKS

[SCF+21] Cristopher Salvi, Thomas Cass, James Foster, Terry Lyons, and Weixin Yang. The signature kernel is the solution of a Goursat PDE. *SIAM Journal on Mathematics of Data Science*, 3(3):873–899, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Sun:2020:LRT

[SGL+20] Yiming Sun, Yang Guo, Charlene Luo, Joel Tropp, and Madeleine Udell. Low-rank Tucker approximation of a tensor from streaming data. *SIAM*

Journal on Mathematics of Data Science, 2(4):1123–1150, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Solomon:2022:VCN

[SGN22] Justin Solomon, Kristjan Greenewald, and Haikady Nagaraja. k-variance: A clustered notion of variance. *SIAM Journal on Mathematics of Data Science*, 4(3):957–978, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/20M1385895`.

Schaeffer:2020:ESS

[SM20] Hayden Schaeffer and Scott G. McCalla. Extending the step-size restriction for gradient descent to avoid strict saddle points. *SIAM Journal on Mathematics of Data Science*, 2(4):1181–1197, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Saibaba:2025:RLR

[SM25] Arvind K. Saibaba and Agnieszka Miedlar. Randomized low-rank approximations beyond Gaussian random matrices. *SIAM Journal on Mathematics of Data Science*, 7(1):136–162, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1593255`.

Salehi:2025:AIF

[SMRE25] Mohammad Sadegh Salehi, Subhadip Mukherjee, Lindon Roberts, and Matthias J. Ehrhardt. An adaptively inexact first-order method for bilevel optimization with application to hyperparameter learning. *SIAM Journal on Mathematics of Data Science*, 7(3):906–936, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1653513`.

Shinde:2021:MES

[SNS21] Nimita Shinde, Vishnu Narayanan, and James Saunderson. Memory-efficient structured convex optimization via extreme point sampling. *SIAM Journal on Mathematics of Data Science*, 3(3):787–814, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Shin:2021:BRC

[SRR21] Jaehyeok Shin, Aaditya Ramdas, and Alessandro Rinaldo. On the bias, risk, and consistency of sample means in multi-armed bandits. *SIAM Journal on Mathematics of Data Science*, 3(4):1278–1300, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Schaub:2020:BIS

[SST20] Michael T. Schaub, Santiago Segarra, and John N. Tsitsiklis. Blind identification of stochastic block models from dynamical observations. *SIAM Journal on Mathematics of Data Science*, 2(2):335–367,

???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Suk:2025:ASN

[Suk25] Joe Suk. Adaptive smooth nonstationary bandits. *SIAM Journal on Mathematics of Data Science*, 7(3):1265–1291, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M167651X`.

Sprangers:2023:GIT

[SV23] Brent Sprangers and Nick Vannieuwenhoven. Group-invariant tensor train networks for supervised learning. *SIAM Journal on Mathematics of Data Science*, 5(4):829–853, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1506857`.

Tan:2024:AMP

[TCSV24] Nelvin Tan, Pablo Pascual Cobo, Jonathan Scarlett, and Ramji Venkataramanan. Approximate message passing with rigorous guarantees for pooled data and quantitative group testing. *SIAM Journal on Mathematics of Data Science*, 6(4):1027–1054, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1604928`.

Torres:2021:NEU

[TCTER21] Leo Torres, Kevin S. Chan, Hanghang Tong, and Tina Eliassi-Rad. Nonbacktracking eigenvalues under node removal: X-centrality and targeted immunization. *SIAM Journal on Mathematics of Data Science*, 3(2):656–675, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Tudisco:2019:NSM

[TH19] Francesco Tudisco and Desmond J. Higham. A nonlinear spectral method for Core–Periphery detection in networks. *SIAM Journal on Mathematics of Data Science*, 1(2):269–292, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Tudisco:2023:CPD

[TH23] Francesco Tudisco and Desmond J. Higham. Core-periphery detection in hypergraphs. *SIAM Journal on Mathematics of Data Science*, 5(1):1–21, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1480926`.

Tian:2024:SBR

[TL24] Yu Tian and Renaud Lambiotte. Structural balance and random walks on complex networks with complex weights. *SIAM Journal on Mathematics of Data Science*, 6(2):372–399, May 2024. CODEN SJMDAQ. ISSN 2577-0187.

Tank:2021:CMD

[TLFS21] Alex Tank, Xiudi Li, Emily B. Fox, and Ali Shojaie. The convex mixture distribution:

Granger causality for categorical time series. *SIAM Journal on Mathematics of Data Science*, 3(1):83–112, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Thao:2020:PRS

[TLSV20] Nguyen Hieu Thao, David Russell Luke, Oleg Soloviev, and Michel Verhaegen. Phase retrieval with sparse phase constraint. *SIAM Journal on Mathematics of Data Science*, 2(1):246–263, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Trillos:2020:MPA

[TM20] Nicolas García Trillos and Ryan W. Murray. A maximum principle argument for the uniform convergence of graph Laplacian regressors. *SIAM Journal on Mathematics of Data Science*, 2(3):705–739, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Tan:2023:DDM

[TMTS23] Hong Ye Tan, Subhadip Mukherjee, Junqi Tang, and Carola-Bibiane Schönlieb. Data-driven mirror descent with input-convex neural networks. *SIAM Journal on Mathematics of Data Science*, 5(2):558–587, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/22M1508613`.

Toth:2025:RFS

[TOS25] Csaba Tóth, Harald Oberhauser, and Zoltán Szabó. Random Fourier signature features. *SIAM Journal on Mathematics of Data Science*, 7(1):329–354, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1620478`.

Trillos:2019:VLN

[Tri19] Nicolas Garcia Trillos. Variational limits of k-NN graph-based functionals on data clouds. *SIAM Journal on Mathematics of Data Science*, 1(1):93–120, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Tanner:2019:MRI

[TTV19] Jared Tanner, Andrew Thompson, and Simon Vary. Matrix rigidity and the ill-posedness of robust PCA and matrix completion. *SIAM Journal on Mathematics of Data Science*, 1(3):537–554, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Udell:2019:WBD

[UT19] Madeleine Udell and Alex Townsend. Why are big data matrices approximately low rank? *SIAM Journal on Mathematics of Data Science*, 1(1): 144–160, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Vershynin:2020:MCN

[Ver20] Roman Vershynin. Memory capacity of neural networks with threshold and rectified linear unit activations. *SIAM Journal on Mathematics of Data Science*, 2(4):1004–1033, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Valdeira:2023:PRG

[VFMS23] Filipa M. Valdeira, Ricardo Ferreira, Alessandra Micheletti, and Cláudia Soares. Probabilistic registration for Gaussian process three-dimensional shape modelling in the presence of extensive missing data. *SIAM Journal on Mathematics of Data Science*, 5(2):502–527, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M1495494.

Veldt:2019:MCO

[VGWS19] Nate Veldt, David F. Gleich, Anthony Wirth, and James Saunderson. Metric-constrained optimization for graph clustering algorithms. *SIAM Journal on Mathematics of Data Science*, 1(2):333–355, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Vacher:2024:OES

[VMB$^+$24] Adrien Vacher, Boris Muzellec, Francis Bach, François-Xavier Vialard, and Alessandro Rudi. Optimal estimation of smooth transport maps with kernel SoS. *SIAM Journal on Mathematics of Data Science*, 6(2):311–342, April 2024. CODEN SJMDAQ. ISSN 2577-0187.

Wang:2024:ONN

[WCPL24] Yifei Wang, Peng Chen, Mert Pilanci, and Wuchen Li. Optimal neural network approximation of Wasserstein gradient direction via convex optimization. *SIAM Journal on Mathematics of Data Science*, 6(4):978–999, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/23M1573173.

Wang:2025:NFM

[WIM25] Haoyue Wang, Shibal Ibrahim, and Rahul Mazumder. Nonparametric finite mixture models with possible shape constraints: a cubic Newton approach. *SIAM Journal on Mathematics of Data Science*, 7(1):163–188, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1430972.

Wu:2025:ELI

[WS25] Mingqi Wu and Qiang Sun. Ensemble linear interpolators: The role of ensembling. *SIAM Journal on Mathematics of Data Science*, 7(2):438–467, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/24M1642548.

Wang:2022:BCG

[WT22] Ke Wang and Christos Thrampoulidis. Binary classification of Gaussian mixtures: Abundance of support vectors, benign overfitting, and regularization. *SIAM Journal on Mathematics of Data Science*, 4(1):260–284, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1415121.

Webber:2021:EBD

[WTD+21] Robert J. Webber, Erik H. Thiede, Douglas Dow, Aaron R. Dinner, and Jonathan Weare. Error bounds for dynamical spectral estimation. *SIAM Journal on Mathematics of Data Science*, 3(1):225–252, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Weir:2020:MMB

[WWZM20] William H. Weir, Benjamin Walker, Lenka Zdeborová, and Peter J. Mucha. Multilayer modularity belief propagation to assess detectability of community structure. *SIAM Journal on Mathematics of Data Science*, 2(3):872–900, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Wang:2020:ERE

[WYSO20] Bao Wang, Binjie Yuan, Zuoqiang Shi, and Stanley J. Osher. EnResNet: ResNets ensemble via the Feynman–Kac formalism for adversarial defense and beyond. *SIAM Journal on Mathematics of Data Science*, 2(3):559–582, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Xie:2022:OGE

[XCRW22] Yuege Xie, Hung-Hsu Chou, Holger Rauhut, and Rachel Ward. Overparameterization and generalization error: Weighted trigonometric interpolation. *SIAM Journal on Mathematics of Data Science*, 4(2):885–908, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1390955.

Xing:2022:BIN

[XSC22] Yue Xing, Qifan Song, and Guang Cheng. Benefit of interpolation in nearest neighbor algorithms. *SIAM Journal on Mathematics of Data Science*, 4(2):935–956, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/21M1437457.

Yongacoglu:2023:SPI

[YAY23] Bora Yongacoglu, Gürdal Arslan, and Serdar Yüksel. Satisficing paths and independent multiagent reinforcement learning in stochastic games. *SIAM Journal on Mathematics of Data Science*, 5(3):745–773, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M1515112.

Yan:2024:EEP

[YJWS24] Chiwei Yan, James Johndrow, Dawn Woodard, and Yanwei Sun. Efficiency of ETA prediction. *SIAM Journal on Mathematics of Data Science*, 6(2): 227–253, April 2024. CODEN SJMDAQ. ISSN 2577-0187.

Yuan:2019:MSH

[YLB+19] Baichuan Yuan, Hao Li, Andrea L. Bertozzi, P. Jeffrey Brantingham, and Mason A. Porter. Multivariate spatiotemporal Hawkes processes and network reconstruction. *SIAM Journal on Mathematics of Data Science*, 1(2):356–382, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Yu:2024:NOC

[YPWR24] Yi Yu, Oscar H. Madrid Padilla, Daren Wang, and Alessandro Rinaldo. Network online change point localization. *SIAM Journal on Mathematics of Data Science*, 6(1): 176–198, March 2024. CODEN SJMDAQ. ISSN 2577-0187.

Yurtsever:2021:SSP

[YTF+21] Alp Yurtsever, Joel A. Tropp, Olivier Fercoq, Madeleine Udell, and Volkan Cevher. Scalable semidefinite programming. *SIAM Journal on Mathematics of Data Science*, 3(1): 171–200, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Yeh:2025:LAD

[YWTT25] Sing-Yuan Yeh, Hau-Tieng Wu, Ronen Talmon, and Mao-Pei Tsui. Landmark alternating diffusion. *SIAM Journal on Mathematics of Data Science*, 7(2):621–642, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1656682`.

Yuan:2025:EEC

[YXKH25] Gan Yuan, Mingyue Xu, Samory Kpotufe, and Daniel Hsu. Efficient estimation of the central mean subspace via smoothed gradient outer products. *SIAM Journal on Mathematics of Data Science*, 7 (3):1241–1264, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1626700`.

Yin:2025:PED

[YZWL25] Shuyu Yin, Qixuan Zhou, Fei Wen, and Tao Luo. A priori estimates for deep residual network in continuous-time reinforcement learning. *SIAM Journal on Mathematics of Data Science*, 7(2):723–751, ???? 2025. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/24M1640811`.

Zhao:2024:FRC

[ZBLR24] Haoyu Zhao, Konstantin Burlachenko, Zhize Li, and Peter Richtárik. Faster rates for compressed federated learning with client-variance reduction. *SIAM Journal on Mathematics of Data Science*, 6(1):154–175, March 2024. CODEN SJMDAQ. ISSN 2577-0187.

Zhang:2021:NBB

[ZG21] Ruda Zhang and Roger Ghanem. Normal-bundle bootstrap. *SIAM Journal on Mathematics of Data Science*, 3(2):573–592, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.

Zhang:2022:FGT

[Zha22] Tong Zhang. Feel-good Thompson sampling for contextual bandits and reinforcement learning. *SIAM Journal on Mathematics of Data Science*, 4(2):834–857, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M140924X`.

Zhang:2023:MEN

[ZK23] Yifan Zhang and Joe Kileel. Moment estimation for nonparametric mixture models through implicit tensor decomposition. *SIAM Journal on Mathematics of Data Science*, 5(4):1130–1159, December 2023. CODEN SJMDAQ. ISSN 2577-0187.

Zhang:2020:IFO

[ZLRY20] Anru R. Zhang, Yuetian Luo, Garvesh Raskutti, and Ming Yuan. ISLET: Fast and optimal low-rank tensor regression via importance sketching. *SIAM Journal on Mathematics of Data Science*, 2(2):444–479, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Zhang:2020:DOC

[ZLZ20] Yuan Zhang, Elizaveta Levina, and Ji Zhu. Detecting overlapping communities in networks using spectral methods. *SIAM Journal on Mathematics of Data Science*, 2(2):265–283, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Zhu:2024:FPD

[ZLZ24] Ya-Nan Zhu, Jingwei Liang, and Xiaoqun Zhang. Federated primal dual fixed point algorithm. *SIAM Journal on Mathematics of Data Science*, 6(4):1138–1172, ???? 2024. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/23M1565528`.

Zilber:2022:GPO

[ZN22] Pini Zilber and Boaz Nadler. GNMR: A provable one-line algorithm for low rank matrix recovery. *SIAM Journal on Mathematics of Data Science*, 4(2):909–934, ???? 2022. CODEN SJMDAQ. ISSN 2577-0187. URL `https://epubs.siam.org/doi/10.1137/21M1433812`.

Zhu:2019:SMD

[ZQW$^+$19] Wei Zhu, Qiang Qiu, Bao Wang, Jianfeng Lu, Guillermo Sapiro, and Ingrid Daubechies.

Stop memorizing: a data-dependent regularization framework for intrinsic pattern learning. *SIAM Journal on Mathematics of Data Science*, 1(3):476–496, ???? 2019. CODEN SJMDAQ. ISSN 2577-0187.

Zheng:2023:EIB

[ZRG23] Léon Zheng, Elisa Riccietti, and Rémi Gribonval. Efficient identification of butterfly sparse matrix factorizations. *SIAM Journal on Mathematics of Data Science*, 5(1):22–49, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M1488727.

Zheng:2020:SSL

[ZYWL20] Xinye Zheng, Jianbo Ye, James Z. Wang, and Jia Li. SCOTT: Shape-location combined tracking with optimal transport. *SIAM Journal on Mathematics of Data Science*, 2(2):284–308, ???? 2020. CODEN SJMDAQ. ISSN 2577-0187.

Zhang:2023:PTQ

[ZZS23] Jinjie Zhang, Yixuan Zhou, and Rayan Saab. Post-training quantization for neural networks with provable guarantees. *SIAM Journal on Mathematics of Data Science*, 5(2):373–399, ???? 2023. CODEN SJMDAQ. ISSN 2577-0187. URL https://epubs.siam.org/doi/10.1137/22M1511709.

Zhang:2021:ELC

[ZZST21] Ning Zhang, Yangjing Zhang, Defeng Sun, and Kim-Chuan Toh. An efficient linearly convergent regularized proximal point algorithm for fused multiple graphical lasso problems. *SIAM Journal on Mathematics of Data Science*, 3(2):524–543, ???? 2021. CODEN SJMDAQ. ISSN 2577-0187.