# Thomas A Courtade

List of Publications by Year
in descending order

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|---|---|---|---|
| 55 papers | 1,081 citations | 623734<br>14 h-index | 526287<br>27 g-index |
| 56 all docs | 56 docs citations | 56 times ranked | 806 citing authors |

| # | Article | IF | Citations |
|---|---------|----|-----------|
| 1 | Multiterminal Source Coding Under Logarithmic Loss. IEEE Transactions on Information Theory, 2014, 60, 740-761. | 2.4 | 114 |
| 2 | Enhanced Precision Through Multiple Reads for LDPC Decoding in Flash Memories. IEEE Journal on Selected Areas in Communications, 2014, 32, 880-891. | 14.0 | 89 |
| 3 | HINGE: long-read assembly achieves optimal repeat resolution. Genome Research, 2017, 27, 747-756. | 5.5 | 88 |
| 4 | Linear Regression With Shuffled Data: Statistical and Computational Limits of Permutation Recovery. IEEE Transactions on Information Theory, 2018, 64, 3286-3300. | 2.4 | 56 |
| 5 | Soft Information for LDPC Decoding in Flash: Mutual-Information Optimized Quantization. , 2011, , . | | 53 |
| 6 | Coded Cooperative Data Exchange in Multihop Networks. IEEE Transactions on Information Theory, 2014, 60, 1136-1158. | 2.4 | 53 |
| 7 | Optimal Allocation of Redundancy Between Packet-Level Erasure Coding and Physical-Layer Channel Coding in Fading Channels. IEEE Transactions on Communications, 2011, 59, 2101-2109. | 7.8 | 39 |
| 8 | Justification of Logarithmic Loss via the Benefit of Side Information. IEEE Transactions on Information Theory, 2015, 61, 5357-5365. | 2.4 | 37 |
| 9 | Denoising linear models with permuted data. , 2017, , . | | 36 |
| 10 | Optimal exchange of packets for universal recovery in broadcast networks. , 2010, , . | | 34 |
| 11 | Existence of Stein kernels under a spectral gap, and discrepancy bounds. Annales De L'institut Henri Poincare (B) Probability and Statistics, 2019, 55, . | 1.1 | 32 |
| 12 | A Strong Entropy Power Inequality. IEEE Transactions on Information Theory, 2018, 64, 2173-2192. | 2.4 | 31 |
| 13 | Multiterminal source coding with an entropy-based distortion measure. , 2011, , . | | 29 |
| 14 | Which Boolean Functions Maximize Mutual Information on Noisy Inputs?. IEEE Transactions on Information Theory, 2014, 60, 4515-4525. | 2.4 | 28 |
| 15 | Coded Cooperative Data Exchange for a Secret Key. IEEE Transactions on Information Theory, 2016, 62, 3785-3795. | 2.4 | 26 |
| 16 | Information Measures: The Curious Case of the Binary Alphabet. IEEE Transactions on Information Theory, 2014, 60, 7616-7626. | 2.4 | 25 |
| 17 | Linear regression with an unknown permutation: Statistical and computational limits. , 2016, , . | | 23 |
| 18 | Information-optimal genome assembly via sparse read-overlap graphs. Bioinformatics, 2016, 32, i494-i502. | 4.1 | 23 |

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|---|---------|-----|-----------|
| 19 | Energy-Efficient Group Key Agreement for Wireless Networks. IEEE Transactions on Wireless Communications, 2015, 14, 5552-5564. | 9.2 | 19 |
| 20 | Strengthening the entropy power inequality. , 2016, , . | | 19 |
| 21 | Information masking and amplification: The source coding setting. , 2012, , . | | 18 |
| 22 | Multiterminal source coding under logarithmic loss. , 2012, , . | | 14 |
| 23 | Outer bounds for multiterminal source coding via a strong data processing inequality. , 2013, , . | | 14 |
| 24 | Brascamp-Lieb inequality and its reverse: An information theoretic view. , 2016, , . | | 14 |
| 25 | Quantitative Stability of the Entropy Power Inequality. IEEE Transactions on Information Theory, 2018, 64, 5691-5703. | 2.4 | 14 |
| 26 | Optimal compressed representation of high throughput sequence data via light assembly. Nature Communications, 2018, 9, 566. | 12.8 | 14 |
| 27 | An extremal inequality for long Markov chains. , 2014, , . | | 13 |
| 28 | A Forward-Reverse Brascamp-Lieb Inequality: Entropic Duality and Gaussian Optimality. Entropy, 2018, 20, 418. | 2.2 | 12 |
| 29 | Compression for Quadratic Similarity Queries. IEEE Transactions on Information Theory, 2015, 61, 2729-2747. | 2.4 | 11 |
| 30 | Fundamental Limits of Genome Assembly Under an Adversarial Erasure Model. IEEE Transactions on Molecular, Biological, and Multi-Scale Communications, 2016, 2, 199-208. | 2.1 | 10 |
| 31 | The Effect of Local Decodability Constraints on Variable-Length Compression. IEEE Transactions on Information Theory, 2018, 64, 2593-2608. | 2.4 | 10 |
| 32 | Approximate capacity of Gaussian relay networks: Is a sublinear gap to the cutset bound plausible?. , 2015, , . | | 9 |
| 33 | Monotonicity of entropy and Fisher information: a quick proof via maximal correlation. Communications in Information and Systems, 2016, 16, 111-115. | 0.5 | 9 |
| 34 | Smoothing Brascamp-Lieb inequalities and strong converses for common randomness generation. , 2016, , . | | 8 |
| 35 | Justification of logarithmic loss via the benefit of side information. , 2014, , . | | 6 |
| 36 | Novel probabilistic models of spatial genetic ancestry with applications to stratification correction in genome-wide association studies. Bioinformatics, 2017, 33, 879-885. | 4.1 | 6 |

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|---|---------|-----|-----------|
| 37 | Bounds on the Poincaré constant for convolution measures. Annales De L'institut Henri Poincare (B) Probability and Statistics, 2020, 56, . | 1.1 | 6 |
| 38 | Compressing sparse sequences under local decodability constraints. , 2015, , . | | 5 |
| 39 | Stability of the Bakry-Émery theorem on Rn. Journal of Functional Analysis, 2020, 279, 108523. | 1.4 | 5 |
| 40 | Optimal Encoding for Discrete Degraded Broadcast Channels. IEEE Transactions on Information Theory, 2013, 59, 1360-1378. | 2.4 | 4 |
| 41 | Smoothing Brascamp-Lieb Inequalities and Strong Converses of Coding Theorems. IEEE Transactions on Information Theory, 2020, 66, 704-721. | 2.4 | 4 |
| 42 | Euclidean Forward–Reverse Brascamp–Lieb Inequalities: Finiteness, Structure, and Extremals. Journal of Geometric Analysis, 2021, 31, 3300-3350. | 1.0 | 4 |
| 43 | Quadratic Similarity Queries on Compressed Data. , 2013, , . | | 2 |
| 44 | Wasserstein stability of the entropy power inequality for log-concave random vectors. , 2017, , . | | 2 |
| 45 | Concavity of entropy power: Equivalent formulations and generalizations. , 2017, , . | | 2 |
| 46 | A Quantitative Entropic CLT for Radially Symmetric Random Vectors. , 2018, , . | | 2 |
| 47 | A Family of Bayesian Cramér-Rao Bounds, and Consequences for Log-Concave Priors. , 2019, , . | | 2 |
| 48 | Sharp Maximum-Entropy Comparisons. , 2021, , . | | 2 |
| 49 | A deterministic approach to rate-compatible fountain communication. , 2010, , . | | 1 |
| 50 | Minimizing weighted sum finish time for one-to-many file transfer in peer-to-peer networks. , 2011, , . | | 1 |
| 51 | Principles and Applications of Science of Information [Scanning the Issue]. Proceedings of the IEEE, 2017, 105, 183-188. | 21.3 | 1 |
| 52 | Counterexample to the Vector Generalization of Costa's Entropy Power Inequality, and Partial Resolution. IEEE Transactions on Information Theory, 2018, 64, 5453-5454. | 2.4 | 1 |
| 53 | Superposition coding to support multiple streams, priorities, and channel capacities in the context of GMSK. , 2011, , . | | 0 |
| 54 | Compression for exact match identification. , 2013, , . | | 0 |

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|---|---------|----|-----------|
| 55 | CommentsComments on â€œCanalizing Boolean Functions Maximize Mutual Informationâ€. IEEE Transactions on Information Theory, 2015, 61, 1149-1151. | 2.4 | 0 |