Herman Kamper

List of Publications by Year
in descending order

44 papers	770 citations	1478505 6 h-index	1125743 13 g-index
44 all docs	44 docs citations	44 times ranked	281 citing authors

#	Article	IF	Citations
1	Feature learning for efficient ASR-free keyword spotting in low-resource languages. Computer Speech and Language, 2022, 71, 101275.	4.3	5
2	A Comparison of Discrete and Soft Speech Units for Improved Voice Conversion. , 2022, , .		25
3	Multilingual and unsupervised subword modeling for zero-resource languages. Computer Speech and Language, 2021, 65, 101098.	4.3	12
4	A Comparison of Self-Supervised Speech Representations As Input Features For Unsupervised Acoustic Word Embeddings. , 2021, , .		9
5	Improved Acoustic Word Embeddings for Zero-Resource Languages Using Multilingual Transfer. IEEE/ACM Transactions on Audio Speech and Language Processing, 2021, 29, 1107-1118.	5.8	7
6	Acoustic Word Embeddings for Zero-Resource Languages Using Self-Supervised Contrastive Learning and Multilingual Adaptation. , 2021, , .		9
7	BINet: A binary inpainting network for deep patch-based image compression. Signal Processing: Image Communication, 2021, 92, 116119.	3.2	3
8	On the expected behaviour of noise regularised deep neural networks as Gaussian processes. Pattern Recognition Letters, 2020, 138, 75-81.	4.2	3
9	Cross-Lingual Topic Prediction For Speech Using Translations. , 2020, , .		0
10	Multilingual Acoustic Word Embedding Models for Processing Zero-resource Languages. , 2020, , .		9
11	Towards Improving Human Arithmetic Learning using Machine Learning. , 2020, , .		2
12	Improving Unsupervised Acoustic Word Embeddings using Speaker and Gender Information. , 2020, , .		2
13	Combining primitive DQNs for improved reinforcement learning in Minecraft. , 2020, , .		0
14	If dropout limits trainable depth, does critical initialisation still matter? A large-scale statistical analysis on ReLU networks. Pattern Recognition Letters, 2020, 138, 95-105.	4.2	0
15	Unsupervised Feature Learning for Speech Using Correspondence and Siamese Networks. IEEE Signal Processing Letters, 2020, 27, 421-425.	3.6	12
16	Training Neural Networks for Plant Estimation, Control and Disturbance Rejection. IFAC-PapersOnLine, 2020, 53, 1664-1670.	0.9	2
17	StarGAN-ZSVC: Towards Zero-Shot Voice Conversion in Low-Resource Contexts. Communications in Computer and Information Science, 2020, , 69-84.	0.5	0
18	Semantic Query-by-example Speech Search Using Visual Grounding. , 2019, , .		10

#	Article	IF	Citations
19	Truly Unsupervised Acoustic Word Embeddings Using Weak Top-down Constraints in Encoder-decoder Models. , 2019, , .		28
20	Multimodal One-shot Learning of Speech and Images. , 2019, , .		17
21	Semantic Speech Retrieval With a Visually Grounded Model of Untranscribed Speech. IEEE/ACM Transactions on Audio Speech and Language Processing, 2019, 27, 89-98.	5.8	26
22	Phoneme Based Embedded Segmental K-Means for Unsupervised Term Discovery. , 2018, , .		5
23	A segmental framework for fully-unsupervised large-vocabulary speech recognition. Computer Speech and Language, 2017, 46, 154-174.	4.3	52
24	An embedded segmental K-means model for unsupervised segmentation and clustering of speech. , 2017, , .		35
25	Weakly supervised spoken term discovery using cross-lingual side information. , 2017, , .		7
26	Towards speech-to-text translation without speech recognition. , 2017, , .		24
27	Deep convolutional acoustic word embeddings using word-pair side information. , 2016, , .		83
28	Unsupervised Word Segmentation and Lexicon Discovery Using Acoustic Word Embeddings. IEEE/ACM Transactions on Audio Speech and Language Processing, 2016, 24, 669-679.	5.8	44
29	Unsupervised neural network based feature extraction using weak top-down constraints. , 2015, , .		66
30	The impact of accent identification errors on speech recognition of South African English. South African Journal of Science, 2014, 110, 1-6.	0.7	1
31	Unsupervised lexical clustering of speech segments using fixed-dimensional acoustic embeddings. , 2014, , .		17
32	Capitalising on North American speech resources for the development of a South African English large vocabulary speech recognition system. Computer Speech and Language, 2014, 28, 1255-1268.	4.3	7
33	Multi-accent acoustic modelling of South African English. Speech Communication, 2012, 54, 801-813.	2.8	10
34	A comparison of neural network methods for unsupervised representation learning on the zero resource speech challenge. , 0, , .		43
35	Query-by-Example Search with Discriminative Neural Acoustic Word Embeddings. , 0, , .		32
36	Visually Grounded Learning of Keyword Prediction from Untranscribed Speech. , 0, , .		33

#	Article	IF	Citations
37	Low-Resource Speech-to-Text Translation. , 0, , .		27
38	Fast ASR-free and Almost Zero-resource Keyword Spotting Using DTW and CNNs for Humanitarian Monitoring. , 0, , .		10
39	Unsupervised Acoustic Unit Discovery for Speech Synthesis Using Discrete Latent-Variable Neural Networks. , 0, , .		21
40	Feature Exploration for Almost Zero-Resource ASR-Free Keyword Spotting Using a Multilingual Bottleneck Extractor and Correspondence Autoencoders. , 0, , .		14
41	Vector-Quantized Neural Networks for Acoustic Unit Discovery in the ZeroSpeech 2020 Challenge. , 0, , .		43
42	ASR-Free CNN-DTW Keyword Spotting Using Multilingual Bottleneck Features for Almost Zero-Resource Languages. , 0, , .		6
43	On the Contributions of Visual and Textual Supervision in Low-Resource Semantic Speech Retrieval. , 0, , .		7
44	Unsupervised vs. Transfer Learning for Multimodal One-Shot Matching of Speech and Images. , 0, , .		2