Resource Summary Report

Generated by dkNET on Apr 18, 2025

Physiobank

RRID:SCR_006949 Type: Tool

Proper Citation

Physiobank (RRID:SCR_006949)

Resource Information

URL: http://physionet.org/physiobank/

Proper Citation: Physiobank (RRID:SCR_006949)

Description: Archive of well-characterized digital recordings of physiologic signals and related data for use by the biomedical research community. PhysioBank currently includes databases of multi-parameter cardiopulmonary, neural, and other biomedical signals from healthy subjects and patients with a variety of conditions with major public health implications, including sudden cardiac death, congestive heart failure, epilepsy, gait disorders, sleep apnea, and aging. The PhysioBank Archives now contain over 700 gigabytes of data that may be freely downloaded. PhysioNet is seeking contributions of data sets that can be made freely available in PhysioBank. Contributions of digitized and anonymized (deidentified) physiologic signals and time series of all types are welcome. If you have a data set that may be suitable, please review PhysioNet''s guidelines for contributors and contact them.

Abbreviations: PhysioBank

Resource Type: database, data or information resource, service resource, data repository, catalog, storage service resource

Defining Citation: PMID:10851218

Keywords: physiologic, signal, data, biomedical, research, community, cardiopulmonary, neural, biomedical, health, cardiac, death, congestive heart failure, epilepsy, gait, disorder, sleep apnea, bibliographic, normal, physiologic signal, time series, FASEB list

Related Condition: Healthy, Sudden cardiac death, Congestive heart failure, Epilepsy, Gait disorder, Sleep apnea, Aging

Funding: NIGMS ; NIBIB U01-EB-008577

Availability: Free, The community can contribute to this resource, Acknowledgement requested

Resource Name: Physiobank

Resource ID: SCR_006949

Alternate IDs: nlx_48903

Record Creation Time: 20220129T080239+0000

Record Last Update: 20250418T055140+0000

Ratings and Alerts

No rating or validation information has been found for Physiobank.

No alerts have been found for Physiobank.

Data and Source Information

Source: SciCrunch Registry

Usage and Citation Metrics

We found 36 mentions in open access literature.

Listed below are recent publications. The full list is available at <u>dkNET</u>.

Kolhar M, et al. (2024) Deep learning hybrid model ECG classification using AlexNet and parallel dual branch fusion network model. Scientific reports, 14(1), 26919.

Zacarias H, et al. (2024) ECG Forecasting System Based on Long Short-Term Memory. Bioengineering (Basel, Switzerland), 11(1).

Neri L, et al. (2023) Algorithm for Mobile Platform-Based Real-Time QRS Detection. Sensors (Basel, Switzerland), 23(3).

Li D, et al. (2022) Fast Sleep Stage Classification Using Cascaded Support Vector Machines with Single-Channel EEG Signals. Sensors (Basel, Switzerland), 22(24).

Uchiyama R, et al. (2022) End-to-End Convolutional Neural Network Model to Detect and Localize Myocardial Infarction Using 12-Lead ECG Images without Preprocessing. Bioengineering (Basel, Switzerland), 9(9).

Martín-Brufau R, et al. (2021) Fibromyalgia Detection Based on EEG Connectivity Patterns. Journal of clinical medicine, 10(15).

Duong T, et al. (2021) Development and optimization of an in vivo electrocardiogram recording method and analysis program for adult zebrafish. Disease models & mechanisms, 14(8).

Wi?niowska B, et al. (2021) How circadian variability of the heart rate and plasma electrolytes concentration influence the cardiac electrophysiology - model-based case study. Journal of pharmacokinetics and pharmacodynamics, 48(3), 387.

Baker S, et al. (2021) Determining respiratory rate from photoplethysmogram and electrocardiogram signals using respiratory quality indices and neural networks. PloS one, 16(4), e0249843.

Jeon E, et al. (2020) A Lightweight Deep Learning Model for Fast Electrocardiographic Beats Classification With a Wearable Cardiac Monitor: Development and Validation Study. JMIR medical informatics, 8(3), e17037.

Cao L, et al. (2020) Alertness-based subject-dependent and subject-independent filter optimization for improving classification efficiency of SSVEP detection. Technology and health care : official journal of the European Society for Engineering and Medicine, 28(S1), 173.

Xiong R, et al. (2020) Pattern Recognition of Cognitive Load Using EEG and ECG Signals. Sensors (Basel, Switzerland), 20(18).

Zhang G, et al. (2020) A Robust Multilevel DWT Densely Network for Cardiovascular Disease Classification. Sensors (Basel, Switzerland), 20(17).

Song HK, et al. (2020) Deep user identification model with multiple biometric data. BMC bioinformatics, 21(1), 315.

Shi M, et al. (2020) Early Detection of Sudden Cardiac Death by Using Ensemble Empirical Mode Decomposition-Based Entropy and Classical Linear Features From Heart Rate Variability Signals. Frontiers in physiology, 11, 118.

Wang L, et al. (2019) Detection of Congestive Heart Failure Based on LSTM-Based Deep Network via Short-Term RR Intervals. Sensors (Basel, Switzerland), 19(7).

Chowdhury MEH, et al. (2019) Wearable Real-Time Heart Attack Detection and Warning

System to Reduce Road Accidents. Sensors (Basel, Switzerland), 19(12).

Liu G, et al. (2019) SVR-EEMD: An Improved EEMD Method Based on Support Vector Regression Extension in PPG Signal Denoising. Computational and mathematical methods in medicine, 2019, 5363712.

Chowdhury MH, et al. (2019) Reconfigurable Architecture for Multi-lead ECG Signal Compression with High-frequency Noise Reduction. Scientific reports, 9(1), 17233.

Hajeb-Mohammadalipour S, et al. (2018) Automated Method for Discrimination of Arrhythmias Using Time, Frequency, and Nonlinear Features of Electrocardiogram Signals. Sensors (Basel, Switzerland), 18(7).