

iPulse Protocol

A Web3 Health Management & Incentive Protocol Empowered by AI and DeSci

Overview

iPulse Protocol is a community-driven global Web3 health management protocol that integrates AI-powered predictive analytics, DeSci collaboration, and DePIN infrastructure. It ensures user data privacy, facilitates data tokenization, and fosters global scientific collaboration while providing precise health guidance.

Through iPulse Protocol, users can not only receive personalized health strategies and disease predictions but also transform their health data into valuable assets. This data can be securely and compliantly shared with research institutions, insurance providers, healthcare services, and smart device manufacturers, creating a sustainable data economy and achieving mutually beneficial outcomes.

Core Features

Precise Health Prediction & Personalized Guidance

- The iPulse Protocol uses multi-dimensional health data, adaptive AI models, and efficient data processing technologies to continuously monitor users' health, predict potential risks, and provide personalized lifestyle recommendations, helping users achieve healthier life goals.

Data Assetization & Value Conversion

- User health data is encrypted and tokenized through the protocol, transforming it into valuable digital assets while ensuring privacy and security. Users can choose to share data with research institutions, insurance companies, healthcare providers, and smart device manufacturers, earning rewards through data transactions, while supporting research and the optimization of health services.

Multi-Device & Scenario Integration

- The iPulse Protocol seamlessly integrates with mainstream smart wearables, managing and analyzing data from multiple devices. With open APIs and developer tools, it facilitates the creation of health management applications based on iPulse, applicable to personal health, corporate wellness programs, insurance assessments, and public health monitoring.

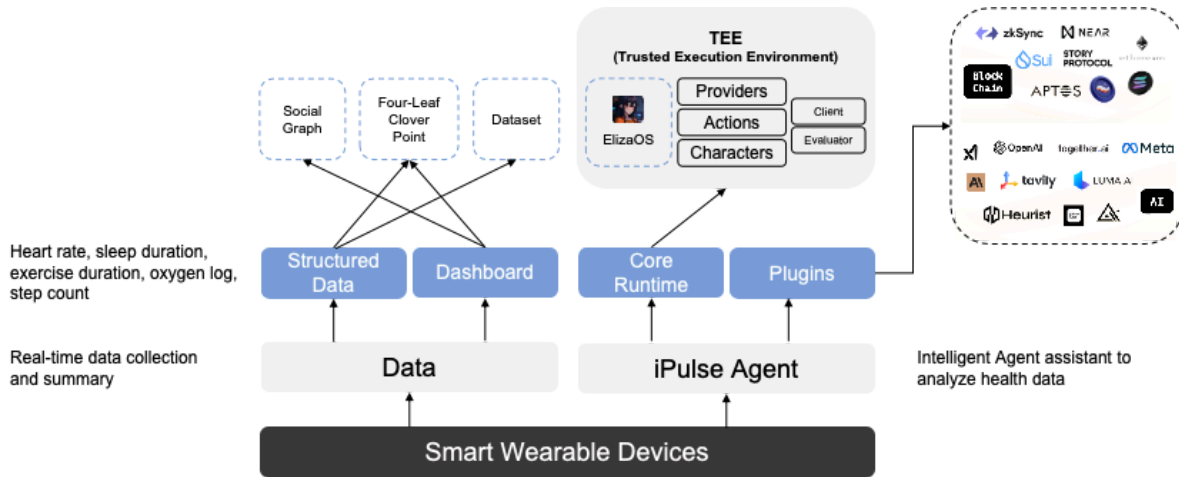
Global Research & Medical Collaboration

- By establishing a decentralized bio-data sharing platform, the iPulse Protocol supports cross-border data collaboration between research institutions and healthcare teams. Anonymized data contributed by users advances disease prevention, treatment development, and pharmaceutical innovation, providing strong support for global public health progress.

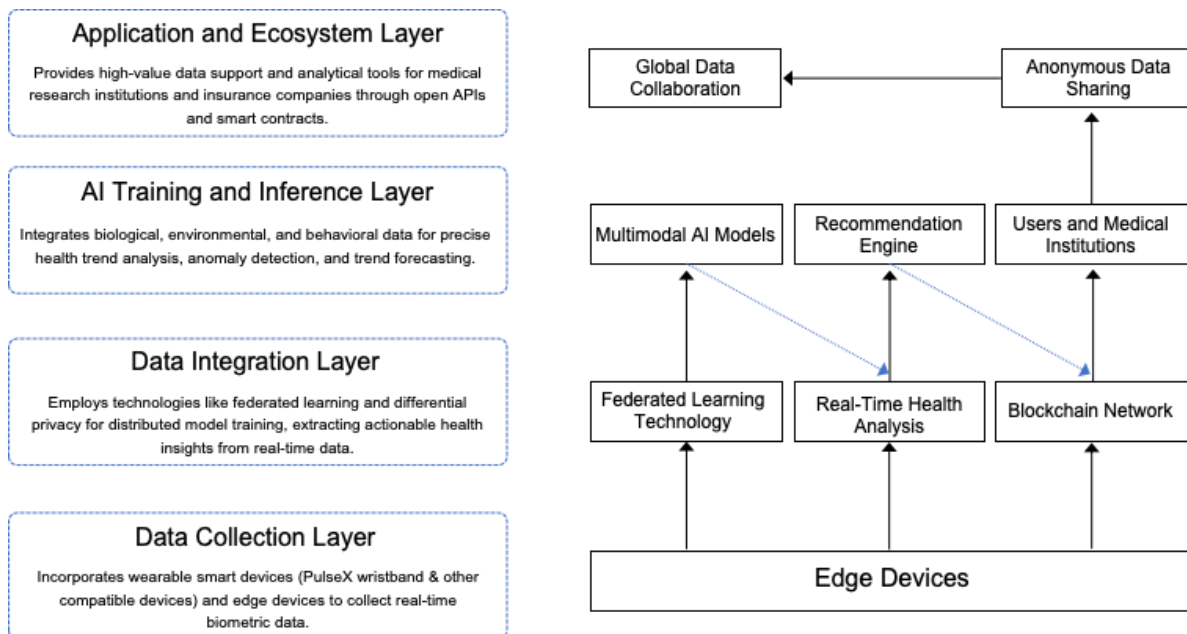
Building a Health Incentive Ecosystem

- The iPulse Protocol's ecosystem incentivizes users to participate in data sharing, health behavior improvements, and protocol development. Additionally, iPulse aims to create a health finance ecosystem, connecting health management centers, hospitals, insurance companies, smart device manufacturers, and health financial services to build a comprehensive and efficient global health management network.

Technical Architecture



iPulse Technical Architecture



iPulse Ecosystem Architecture

Data Collection Layer

- Integrates data sources from wearable devices (such as the PulseX smart band), medical devices, mobile applications, etc., and uploads health data via Bluetooth, LoRa, Wi-Fi, and other protocols.

Data Storage & Management

- Uses decentralized storage (such as IPFS) to protect user data privacy while reducing the risk of single-point failures.
- Incorporates federated learning, differential privacy, and homomorphic encryption to ensure the anonymized storage and analysis of user data.

AI Large Model Training

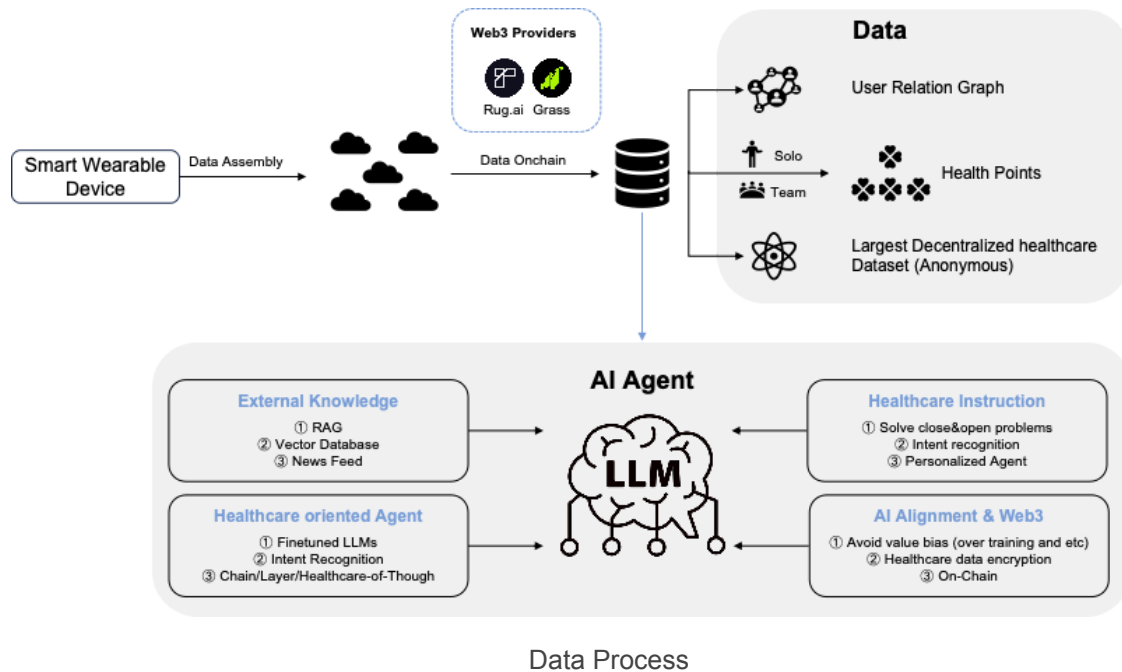
- Trains models based on health data using Transformer architectures (e.g., BioBERT) for pre-training on massive datasets to enhance foundational understanding.
- Through federated learning, models are continually updated on the user side, ensuring data privacy while maintaining personalization and generalization.
- Employs time-series analysis models (e.g., RNN, LSTM) to predict user health trends, and integrates reinforcement learning to provide personalized treatment recommendations.
- Utilizes multi-task learning models to analyze the complex relationships between physiological data and disease characteristics.

Model Inference & Application

- Deploys models using ONNX Runtime, combining edge AI technologies for low-latency inference on devices.
- Integrates Generative Adversarial Networks (GAN) or diffusion models to simulate various treatment options and recommend the optimal choice for users.

Data Assetization & Ecosystem Collaboration

- Converts health data into tokens compliant with ERC-721 or ERC-1155 standards, managed through blockchain smart contracts for access control and revenue distribution.
- Offers open APIs and SDKs, enabling healthcare institutions and researchers to use anonymized data for new drug development, disease research, and DeSci collaboration.



1. Technical Implementation Path

Data Collection and Intelligent Analysis

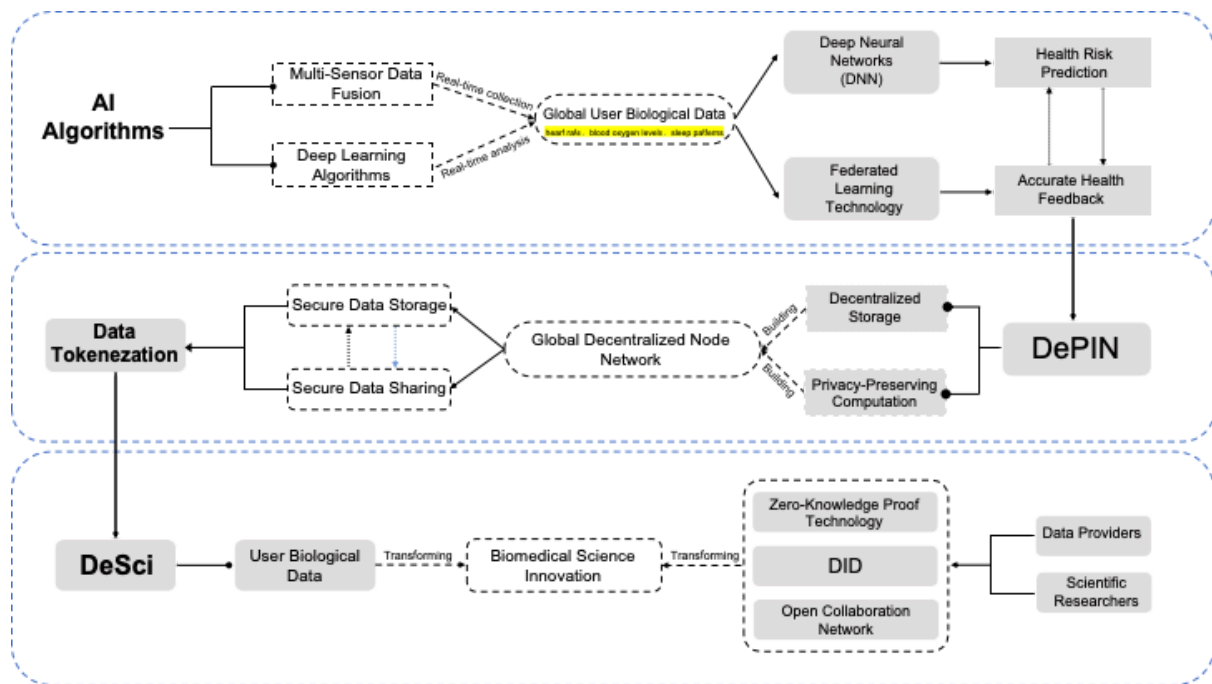
The iPulse Protocol leverages multi-source sensor fusion and deep learning algorithms to continuously collect and analyze user biometrics (such as heart rate, blood oxygen, etc.), utilizing deep neural networks to predict health risks. The protocol employs federated learning technology, ensuring that models analyze data locally and encrypt it, thereby guaranteeing privacy while providing precise feedback.

DePIN Support

iPulse utilizes distributed storage and privacy computing to enable secure data storage and sharing through a global decentralized node network. Health data is transmitted using dynamic encryption technologies, allowing users to securely access, manage, and authorize the use of their data while maintaining privacy. Simultaneously, data is tokenized within the DePIN network, assigning economic value to health data and enabling it for authorized transactions and value circulation.

DeSci Collaboration

iPulse supports decentralized scientific collaboration, allowing health data to be used securely by research institutions while remaining anonymized. The protocol connects researchers with data providers, fostering cross-regional and cross-institutional scientific collaborations that drive innovation in medicine and biotechnology.



iPulse Web3 Technology Implementation Path

2. AI Agent

Large Model Technology

- MoE Architecture
 - Based on large model technology, the MoE (Mixture-of-Experts) architecture is adopted, drawing on practices from DeepSeek-v3 and Mistral to build a hybrid expert model system. This system is fine-tuned for different health management scenarios (e.g., chronic disease management, diabetes knowledge base, sports injury prevention for the Asian population) and supports dynamic plug-and-play invocation. It significantly reduces operational costs while ensuring low token consumption, offering a cost reduction of 1/20 to 1/50 compared to mainstream solutions like OpenAI and Anthropic.
- Knowledge Base
 - Using RAG (Retrieval-Augmented Generation) technology to structure common medical databases, combined with intent recognition mechanisms to dynamically select content from the knowledge base. This design reduces context dependence while ensuring that the large model can provide precise and insightful health recommendations based on real-time user activity and basic physiological data.
 - **Advanced Feature:** Integrating a genetic recognition suite (e.g., wegene) to structure and store user genetic data (including hereditary disease history, target gene defect analysis, common disease risks, and individual traits) in a RAG knowledge base, significantly improving the accuracy of personalized treatment plan generation by the large model.

Real-Time Data Sources

- Timely Data
 - Integrating Tavily and a medical big data real-time search engine to support similar case analysis for users.
- Environmental Data Fusion
 - Real-time acquisition of local weather data, combined with user genetic traits and current vital signs, to generate scientifically grounded and actionable exercise recommendations and health plans.

Multimodal Learning

- Multidata Fusion and Standardization
 - Integrating biological features (e.g., heart rate, blood oxygen, genomic data), environmental variables (e.g., air quality, climate data), and behavioral patterns (e.g., exercise habits, sleep states).
 - Referring to the PHIA (Google DeepMind, July 2024) intelligent wristband Agent system, a professional health team is introduced to establish the standard for the intelligent wristband AI Agent.

Transfer Learning

- Model Regional Adaptation
 - Utilizing region-specific health data (e.g., chronic disease characteristics in the Asian population) to fine-tune pre-trained models and adapt them to local health management needs.
 - Through Zero-Shot Learning, the model gains the ability for cross-regional application.
 - ▶ *Example: Diabetes Management for the Asian Population*
Given the high diabetes prevalence and its close association with dietary habits in the Asian population, pre-trained models are fine-tuned using health data from regions like China, Japan, and Korea. For example, the model can recognize insulin resistance characteristics common in the Asian population and, combined with local dietary habits (e.g., high carbohydrate intake), provide personalized dietary recommendations.
- Personalized Fine-Tuning
 - Combining individual user data (e.g., genetic traits, lifestyle habits) to dynamically adjust model parameters and offer more accurate health recommendations.
 - ▶ *Example: Exercise Recommendations Based on User Genetic Data*
For users carrying specific genetic variants (e.g., ACTN3 gene, related to muscle explosiveness), the model dynamically adjusts the exercise plan, recommending more explosive training (e.g., sprinting, weightlifting) rather than endurance training (e.g., long-distance running).

Real-Time Analysis

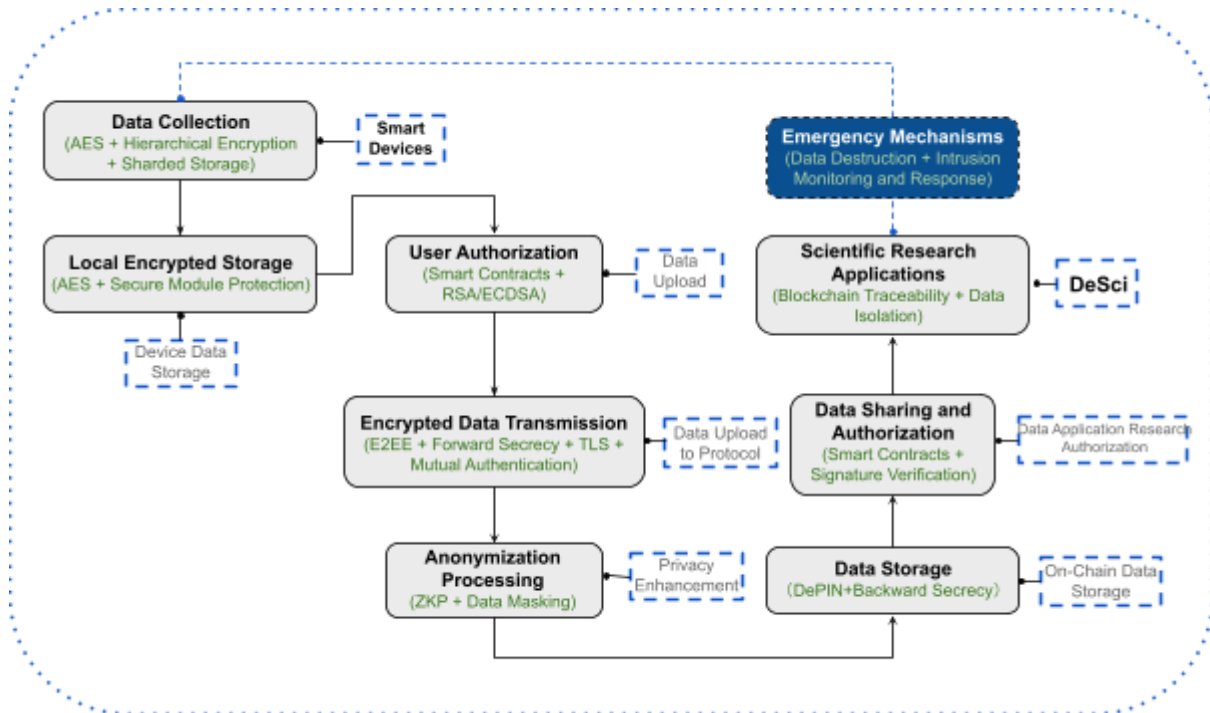
- Real-Time Data Stream Processing
 - Integrating Apache Kafka and Flink to enable real-time data ingestion and analysis.
 - ▶ *Example: Real-Time Heart Rate Anomaly Warning*
During daily activities, the smart bracelet receives real-time heart rate data streams through Apache Kafka. If the heart rate consistently exceeds a preset threshold (e.g., resting heart rate > 100 bpm), the system triggers an immediate alert, warning the user of potential fatigue or cardiovascular issues.
- Anomaly Detection
 - Introducing self-supervised learning models to identify health anomalies by analyzing latent distribution changes in user data.
 - Generating real-time health alerts (e.g., predicting cardiovascular events or detecting acute conditions).
 - ▶ *Example: Acute Hypoglycemia Warning*
For diabetic patients, the model analyzes real-time blood glucose data and exercise status to predict hypoglycemia risk. For instance, if blood sugar levels drop rapidly after exercise, the system prompts the user to promptly replenish glucose.
- Health Trend Prediction
 - Using time-series modeling to predict future health trends, enabling the early development of preventive health plans.
 - ▶ *Example: Cardiovascular Health Trend Analysis*
Based on long-term heart rate variability (HRV) and blood pressure data, the model uses time-series analysis to predict future cardiovascular health trends. For example, if the model predicts an increase in cardiovascular risk within the next three months, it will proactively recommend dietary adjustments, more aerobic exercise, or medical checkups.

Personalized Recommendations

- Reinforcement Learning
 - Optimizing health intervention strategies based on users' historical data and health goals. Continuously learning from user feedback (e.g., exercise adherence rate) to improve recommendation effectiveness.
 - ▶ *Example: Dynamic Adjustment of Exercise Goals*
A user sets a goal to lose 2 kg per month, with an initial recommendation of running 30 minutes daily. Through reinforcement learning, the model dynamically adjusts the exercise plan based on the user's actual activity data (e.g., running frequency, heart rate changes) and weight loss feedback. For example, if the weight loss rate is slower, the model might suggest increasing the running duration or incorporating high-intensity interval training (HIIT).
- Recommendation Content
 - Dynamically adjusting health management advice, including diet plans, exercise routines, and lifestyle optimization suggestions.

- ▶ *Example: Diet Plan Optimization*
The user inputs their daily food intake, and the model adjusts diet recommendations dynamically based on the user's health goals (e.g., fat loss, muscle gain) and real-time physiological data (e.g., blood sugar levels). For example, if the user's blood sugar levels are elevated, the model might recommend reducing carbohydrate intake and increasing dietary fiber.

3. Privacy Protection Implementation



Device-side Privacy Processing

1) Data Collection and Local Storage

- **Data Collection:**
 - The wearable devices continuously collect health data, including heart rate, blood oxygen levels, sleep, stress, and other metrics.
 - The data is formatted and preprocessed for subsequent analysis and transmission.
 - **Device-Side Storage and Cloud Synchronization:**
 - A real-time data validation mechanism is added to verify the validity of the collected physiological data (iPulse Protocol).
 - Reasonable threshold ranges are set for various metrics, such as a heart rate of 40–200 bpm.
 - Anomalous value detection algorithms identify outliers and abnormal data points.
 - Sensor status monitoring ensures data quality (to avoid issues like cumulative error caused by IMU sensors).

- **Data denoising preprocessing (vendor-side):**
 - Kalman filtering is used to handle motion noise.
 - Wavelet transform removes environmental interference.
 - Adaptive filtering algorithms optimize signal quality.
- **Local Encrypted Storage:**
 - **Symmetric encryption techniques (AES)** are used to encrypt the collected data.
 - The encryption keys are stored in the wearable device's secure module, ensuring that even if the device is lost or stolen, the data cannot be accessed.
 - The encrypted data is stored in blocks locally, forming an offline secure repository of the user's personal data.
 - **Hierarchical Encryption Storage Strategy:**

```
class DataEncryption:
    def encrypt_level1(self, data): # Regular Data
        return AES_encrypt(data, key_level1)

    def encrypt_level2(self, data): # Sensitive Data
        return AES_encrypt(data, key_level2) +
hash_sign()
```

- **Data Sharding Storage:**
 - Sensitive data is shard-stored in different storage areas.
 - Each shard uses an independent encryption key.
 - Multiple verifications are required to reconstruct the data when accessed.

2) Data Upload and Transmission:

- **Upload Process:**
 - Upon user authorization, the encrypted health data is uploaded to the distributed storage network of the iPulse Protocol from wearable devices.
 - **Asymmetric encryption (RSA/ECDSA):**
 - Data is encrypted with the public key of the recipient (iPulse Protocol).
 - The transmitted content includes encrypted data blocks, sender identity, timestamp, and other metadata.
 - **Mutual Authentication Mechanism:**
 - Both the device and the server authenticate each other's identity:
 1. The device sends an authentication request along with the device ID and timestamp.
 2. The server responds with a random challenge code.
 3. The device signs the challenge code with its private key.
 4. The server verifies the signature and establishes an encrypted communication channel.
 - Device Uniqueness Verification Based on Hardware Fingerprint:
 - Dynamic token-based authentication mechanism.

- **Transmission Protection:**
 - **End-to-end encryption** and **one-time session keys (Forward Secrecy)** are used to prevent man-in-the-middle attacks. Even if long-term keys are compromised, historical data cannot be decrypted.
 - During transmission, **TLS (Transport Layer Security)** protocol is applied to further enhance communication security.

3) Data Sharing

- **User-Authorized Anonymization:**
 - Before uploading, sensitive information is anonymized using **Zero-Knowledge Proof (ZKP)** technology, ensuring that shared data cannot identify the user.
 - The scope and purpose of data sharing are fully controlled by the user, and unauthorized access is prohibited.
- **Encrypted Signature Verification:**
 - The wearable devices use the user's private key to digitally sign the uploaded data, and the recipient verifies the authenticity and integrity of the data through the public key.

iPulse Protocol Privacy Processing

1) Data Storage and Privacy Protection

- **Distributed Storage Network (DePIN):**
 - Data is stored on distributed nodes rather than a single centralized server, eliminating the security risks associated with large-scale centralized storage.
 - Data remains encrypted during both transmission and storage on the network, with nodes only storing encrypted data and unable to access the content of the data.
- **Dynamic Key Updates (Backward Secrecy):**
 - Old keys are periodically revoked, and new key pairs are generated to prevent future data from being compromised due to the leakage of old keys.

2) Data Sharing and Application

- **User Authorization Management:**
 - Data sharing is entirely based on user authorization, with smart contracts dynamically controlling access permissions and usage of data.
 - For example, the user can choose to share sleep data from a specific time period for research purposes, while not sharing heart rate data.
- **Anonymization and Security Verification:**
 - The iPulse Protocol strictly anonymizes all received data, ensuring that no organization or individual can associate the data with the user's identity.
 - Shared data is verified through the sender's signature and a traceability mechanism, ensuring the data's source is trustworthy and the content remains unaltered.

- **DeSci Collaboration:**
 - After anonymization, data can be made available to research institutions and medical teams for disease prediction, public health analysis, etc. All processes are recorded on the blockchain, ensuring transparency and public access.

Emergency Mechanism

- **Data Destruction Mechanism Design:**
 - Remote Erasure Function
 - Automatic Timeout Deletion
 - Ensures that data is unrecoverable through multiple rounds of erasure.
- **Intrusion Detection and Response:**
 - Real-time monitoring of abnormal access behaviors.
 - Automatic locking of suspicious accounts.
 - Audit logs are retained for traceability.

Joint Privacy Protection

1) Key Technologies

1. **Symmetric Encryption:** Used for local data storage to ensure data security when the device is offline.
2. **Asymmetric Encryption:** Used for data upload and transmission processes to ensure confidentiality and security during communication.
3. **Zero-Knowledge Proofs (ZKP):** Used for anonymizing sensitive information and protecting user privacy.
4. **End-to-End Encryption (E2EE):** Ensures full-link data transmission protection.
5. **Distributed Storage (DePIN):** Eliminates the risks of centralized storage, enhancing data availability and resistance to attacks.

2) Privacy Protection Advantages of Joint Ecosystem

- **Full-Link Protection:** From data collection to storage, transmission, and sharing, encryption and verification technologies are used throughout, ensuring the security of user data.
- **User-Driven Privacy:** Data upload, storage, and sharing all require user authorization, ensuring privacy sovereignty.
- **Efficient Collaboration:** By combining the technologies of iPulse Protocol and wearable devices, efficient collaboration in health management and scientific research is promoted, while privacy is guaranteed.

4. Technical Advantages

Adaptive AI Model

- The protocol incorporates adaptive AI algorithms that utilize deep learning to dynamically adjust to users' real-time health data and trend changes, providing personalized health predictions and disease risk assessments. The model automatically optimizes as data accumulates, continuously improving prediction accuracy and intelligence.

Efficient Data Processing and Analysis

- The protocol employs distributed computing and big data analytics technologies to process and analyze vast amounts of biological data quickly. This enables it to meet personal health management needs while supporting deep data mining for research institutions, insurance companies, and other organizations, thus expanding its application scope.

Privacy Protection and Data Assetization

- The protocol ensures user data security through privacy protection mechanisms while enabling the assetization of health data. Users can earn token incentives by contributing data, benefiting from the circulation of data value.

Open APIs and Ecosystem Integration

- The protocol provides open API interfaces, facilitating the integration and expansion of third-party applications and corporate health management systems. With flexible APIs, it supports the development of diverse health management applications, building a rich ecosystem.

Highly Scalable Architecture Design

- Based on a modular and microservices architecture, the protocol boasts high scalability, supporting the integration of multiple data sources (such as environmental data, genomic data, etc.). It also facilitates the addition of new functionalities or the adaptation to more smart devices, serving a broader range of health management scenarios.

Positive Feedback Loop Ecosystem

- Through multi-party collaboration in data and technology, every participant in the ecosystem can capture value while contributing to the ecosystem's growth, creating a virtuous cycle of health management and data application.

5. Protocol Application Scenarios

Every individual's daily health data and medical-grade data hold immense value. iPulse integrates blockchain and artificial intelligence technologies to provide continuous health and medical services to users, while protecting data privacy. Additionally, users' data holds significant research value. With the user's consent, iPulse can provide anonymized data for medical and research institutions in exchange for compensation, using smart contracts to facilitate revenue distribution, with rewards given to users in the form of tokens. Through

iPulse, users not only receive comprehensive health management and medical services but also contribute to advancements in medical technology.

Personal Health Management

- The protocol helps users monitor personal health data in real-time, generating multi-dimensional health reports and trend analyses, enabling users to adjust their lifestyles based on their health conditions. The AI prediction feature provides personalized health alerts and disease risk notifications, assisting in scientific self-health management.

Medical and Insurance Support

- The protocol offers medical institutions access to long-term health data, supporting doctors in developing personalized treatment plans. Insurance companies can use protocol data analysis to accurately assess health risks, design more effective insurance products, and streamline claim processes, improving overall customer service quality.

Global Public Health Monitoring

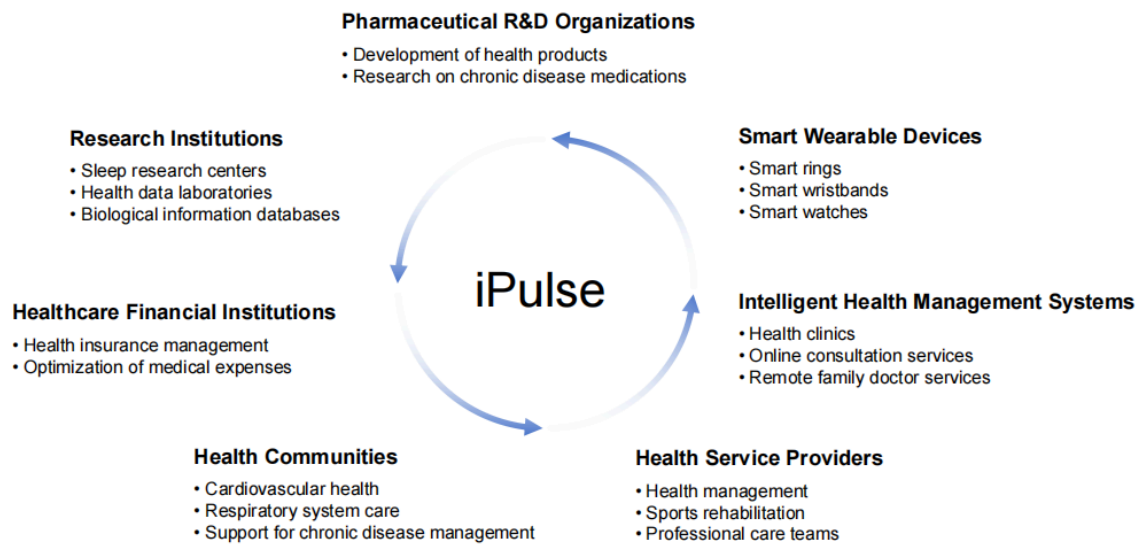
- Through a global biological data network, the protocol provides health data support for public health monitoring and epidemiological research. It helps governments and health organizations analyze disease transmission trends and develop epidemic prevention strategies. The protocol also facilitates international data sharing and collaboration, enhancing efficiency in responding to health crises and ensuring global public health security.

Global Research and Innovation

- The protocol builds a global biological database to support research institutions in achieving cross-border health data sharing, driving disease research, new drug development, and treatment innovations. The international health research network accelerates scientific progress, boosts innovation efficiency, and injects new momentum into global health initiatives.

Support for Smart Device Manufacturers

- Smart device manufacturers can access user-authorized health data via the protocol, optimizing product features and improving user experience. By analyzing the multi-dimensional health data generated by the protocol, manufacturers gain deeper insights into user needs, refine product design, and enhance market competitiveness, which ultimately boosts product sales. Additionally, collaboration with the protocol ecosystem helps jointly advance the development and application of health technology.



iPulse Ecosystem Application

iPulse Tokenomics

iPulse adopts a diversified economic model, providing continuous incentives for participation and collaboration among various ecosystem stakeholders (users, research institutions, healthcare providers, insurance companies, device manufacturers, etc.). To achieve this, the protocol introduces a dual-track incentive system: a points system and the native token PULSE.

Points System

Points act as a real-time incentive tool within the application, encouraging users to maintain healthy behaviors in their daily lives, actively upload data, and engage with community interactions. Points can be redeemed for rewards or converted into PULSE tokens.

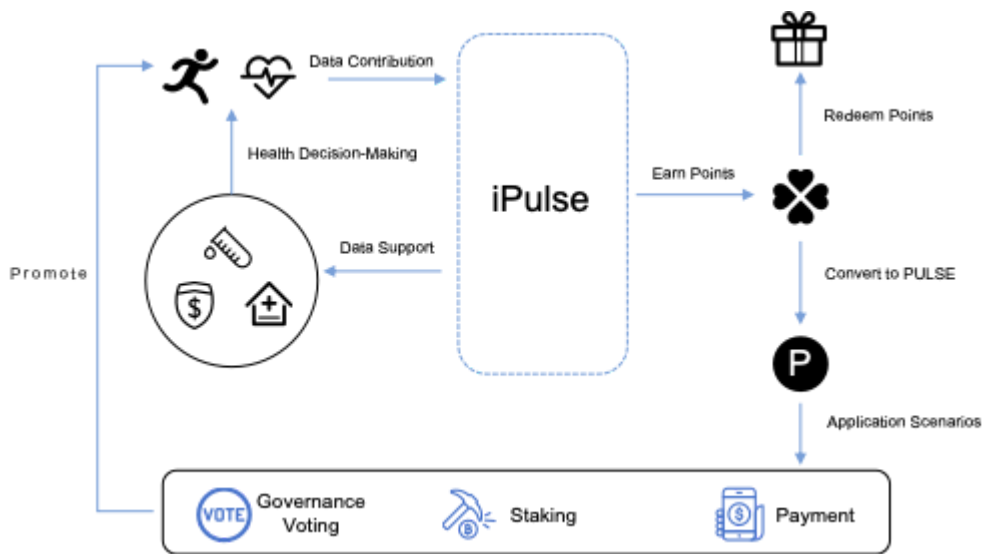
Native Token PULSE

PULSE is the core value carrier of the iPulse ecosystem, used in high-value scenarios such as quality staking, ecosystem applications, internal payments, community governance, and voting decisions.

Value Interaction Between Points and PULSE

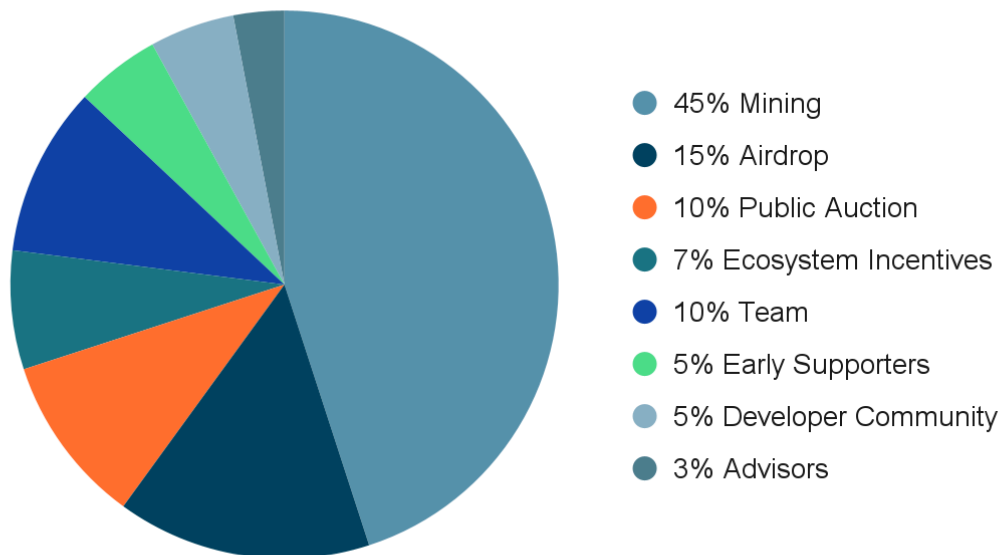
In the iPulse economic model, users earn "points" as immediate rewards for their healthy behaviors and data contributions. These points cultivate user engagement and healthy habits, and they can be used to unlock value-added services or accelerate PULSE acquisition and ecosystem privileges. As a long-term value carrier, PULSE works in synergy

with points to form a virtuous cycle, fulfilling short-term user incentives while guiding users toward higher-value, long-term participation (e.g., staking, payments, governance, etc.).



1. PULSE Token Allocation

PULSE is the native token of the iPulse ecosystem, with a total amount of 10 billion, serving as the core value storage and transfer carrier with broad application scenarios.



Core Functions

- **Governance and Decision-Making:** PULSE holders can participate in ecosystem governance and adjust voting decisions.
- **Value-Added Payment:** Used to pay for premium services, data access, and medical resource costs.
- **Staking and Mining:** Participate in PoS or specific mining mechanisms to gain income and optimize resource rights and benefits.

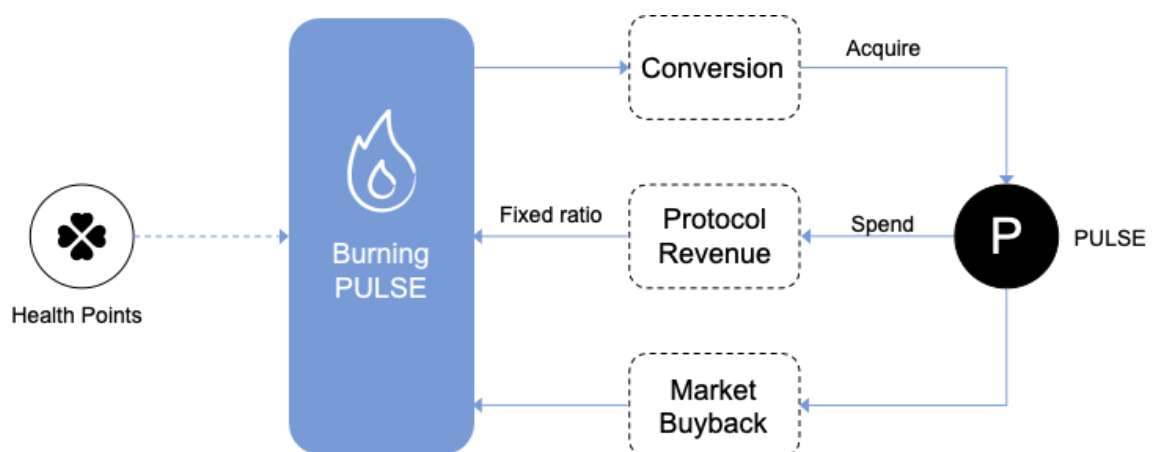
Acquisition Methods

- **Data Contribution and Healthy Behavior:** Users can earn PULSE by contributing health data and achieving health goals, which are converted from earned points.
- **Staking and Mining:** Stake PULSE to participate in mining, gain sustained benefits, and foster long-term engagement.
- **Community Incentives:** Participate in activities, governance, and innovation projects to earn PULSE rewards and airdrops.

2. PULSE Deflation Mechanism

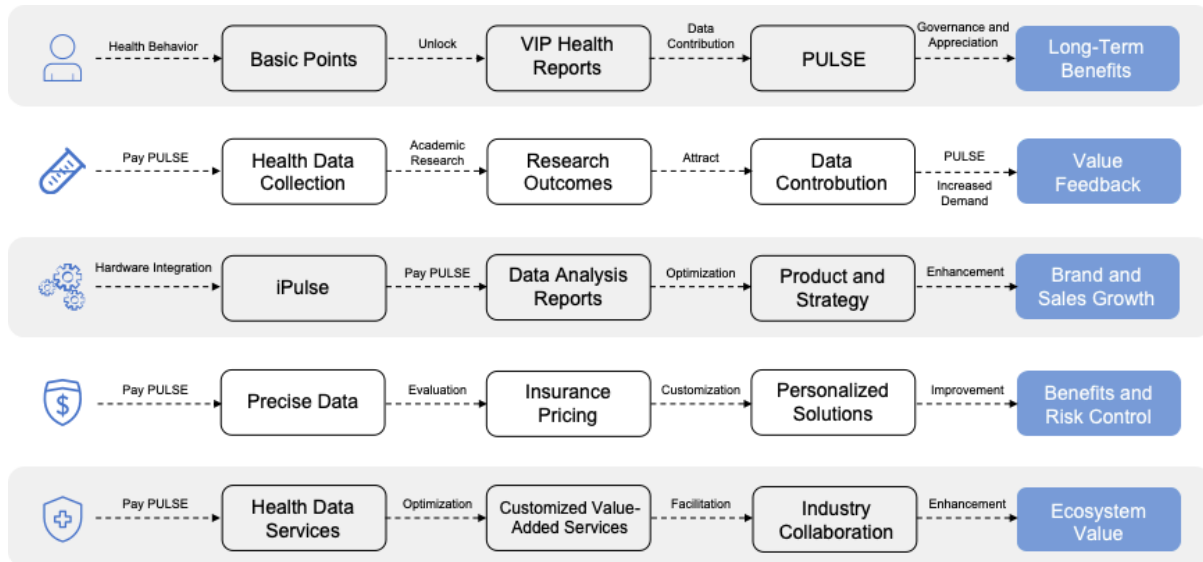
To ensure the long-term value of PULSE, the iPulse Protocol has set up a deflationary mechanism:

- A certain amount of PULSE must be burned when converting Health Points into PULSE.
- A proportion of the PULSE spent within the iPulse ecosystem will be directly burned.
- The iPulse will periodically repurchase PULSE from the market and burn it to reduce the circulating supply.



3. iPulse Ecosystem Sustainability

The iPulse Protocol's economic model emphasizes long-term value accumulation and achieves sustainability through multi-dimensional collaboration. Below are the roles and benefits of different ecosystem participants within the iPulse ecosystem:



Individual Users

Individual users earn points through health behaviors and data contributions, which can be converted into PULSE. Users can use points or PULSE to unlock VIP health reports, receive personalized nutrition advice, exercise plans, and health trend analysis. Additionally, users can participate in community health research projects by uploading anonymous data to earn PULSE rewards. As the ecosystem grows, the value of PULSE increases, providing long-term benefits and improving users' health management.

Research and Pharmaceutical Institutions

Research and pharmaceutical institutions can purchase anonymous health data sets with PULSE, providing data support for academic research and drug development. As research progress is shared, more users join the ecosystem and contribute data, driving the accumulation of ecosystem value.

Device Manufacturers

Device manufacturers provide hardware compatible with the iPulse Protocol to support the inflow of more user data into the ecosystem. On this basis, manufacturers can pay PULSE to obtain data analysis reports to optimize product design and sales strategies, thereby enhancing brand influence.

Insurance Companies

Insurance companies obtain accurate health data analysis by paying PULSE, which helps evaluate the health risks and pricing of insurance policies for user groups. Based on data insights, insurance companies can offer personalized insurance plans, optimizing the plans to reduce claims risk and improve profitability.

Health Service Providers

Health service providers pay PULSE to access health data, optimize health management courses, and rehabilitation plans. By improving services driven by data, customer satisfaction increases, attracting more users, ultimately boosting the circulation of PULSE and enhancing the ecosystem's value.

Team

Jude. A — COO

Jude is a strategically insightful and execution-driven COO, with previous experience at Biconomy, WeDataNation, and Elk.Finance DAO, where he established high-value partnerships that helped projects stand out. He successfully led Oura Ring's market expansion into Africa, increasing brand awareness and facilitating key business collaborations. Additionally, he co-founded the Web3 Global Conference in Nigeria, driving the growth of the African Web3 community.

Cora — CMO

Cora has 9 years of experience in the Web3 space, having contributed to Binance's early global expansion. She has served as CMO and CIO for Tier-1 blockchain projects like Neo and worked with over 100 top venture capital portfolio companies, providing market strategy guidance for various early-stage blockchain projects across AI, DeFi, and other sectors. Cora excels in global marketing, with expertise in Chinese-speaking regions, Japan, Korea, Europe, and North America.

Evan — CBDO

Evan has 8 years of blockchain and fintech experience, having served as a Business Development Manager at Hotbit and PBWS, as well as COO at an early-stage DeFi infrastructure company. He is currently a partner at an investment firm, focusing on projects related to blockchain infrastructure, decentralized AI, DeFi, and NFTs. With expertise in strategic planning, market expansion, fundraising, and resource integration, Evan has helped several startups achieve rapid market entry and cross-industry collaborations.

Sam — AI DevRel

Sam is a senior AI expert, previously working at Alibaba DAMO Academy, with over 600 citations on Google Scholar from research presented at more than 10 top conferences, including NeurIPS, CVPR, and ICCV. He is the author of DeepFaceLab, a core contributor to PyTorch and TensorFlow, and led one of the top 20 projects on HuggingFace Spaces. As a core member of ai16z, he has shown exceptional skills in AI open-source innovation and advancing the developer community.

Roadmap

2024 Q4

- Define the core application scenarios and technical positioning.
- Establish a core technical and health data expert team.
- Launch the official website and social media channels; initiate community preheating.
- Start the Pre-Seed fundraising round.
- Onboard early partners, validate MVP, and establish user base.

2025 Q1

- Complete the Pre-Seed fundraising round.
- Finalize the protocol draft and begin foundational technology development.
- Release the protocol's alpha version and begin internal testing.
- Integrate the first DApp, PulseX, to collect feedback.
- Analyze feedback to plan privacy and security measures.

2025 Q2

- Complete the Seed fundraising round.
- Release the first smart device, PulseX wristband.
- Open APIs and SDKs for developers, creating an integration-friendly ecosystem.
- Officially launch Protocol V1 and make it available to early users.
- Implement basic privacy and security mechanisms.

2025 Q3

- Initiate the Pre-A round and Public Auction.
- Launch AI-driven health monitoring modules.
- Strengthen data anonymization and privacy techniques.

- Deploy the economic model.
- Introduce more health monitoring and medical service DApps.

2025 Q4

- Complete the Pre-A round and Public Auction.
- Expand international market efforts with a focus on key regions.
- Ensure protocol compatibility with leading smart device brands.
- Introduce PULSE governance functionality for decentralized management and proposals.

2026 Q1

- Launch user incentive mechanisms to encourage data contributions and community building.
- Optimize smart contracts to improve efficiency and user experience.
- Onboard DApps focused on medical consultation, health finance, and related sectors.
- Expand to international markets with localized teams.

2026 Q2

- Collaborate with international standard organizations and industry associations to align health data standards.
- Optimize AI models for enhanced prediction accuracy across regions and languages.
- Deploy cross-chain interoperability solutions for seamless data and value transfers.
- Stabilize tokenomics through market buybacks and adjustments.

2026 Q3

- Strengthen partnerships with medical equipment manufacturers, insurance companies, and pharmaceutical leaders.
- Enhance privacy compliance and collaborate with regulatory agencies.
- Expand support for DeSci projects, accelerating drug research and precision medicine.
- Launch health ecosystem reports and indexes to increase transparency and trust.

2026 Q4

- Continuously improve the protocol based on community proposals and governance results.

- Expand AI functionalities to include emotion recognition and psychological health applications.
- Develop innovative health insurance and financing products, such as tokenized insurance.
- Establish a global reputation as the foundational infrastructure of the health data and scientific research ecosystem.