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THE CYBERNETIC ECONOMIC INTELLIGENCE FOUNDATION

Cybernetic P2P Fulfillment Solution

A New Model for Ownership and Investment in the Age of Automation

Fulfillment centers have historically served as a source of employment for individuals with lower levels of skill in the United States. However, the introduction of more sophisticated production technologies has sparked a new wave of automation that is supplanting human labor with machines. This trend is rapidly gaining momentum, with projections suggesting that as much as a quarter of existing warehouse jobs may be replaced by robots within the next decade. The economic ramifications of this trend are far-reaching, extending well beyond the affected laborers and permeating throughout the wider economy.

In response, the CEIF offers a novel ownership and investment framework for fulfillment centers - the Cybernetic P2P Fulfillment model. By distributing ownership rights and investment opportunities among a network of stakeholders, this model ensures equitable and decentralized distribution of profits while simultaneously advancing community empowerment.

Introduction

Fulfillment centers have a crucial role in ensuring the smooth movement of goods and services in today's economy. They cater to the growing needs of the e-commerce industry and other sectors. However, there is a noticeable shift towards automation in the warehousing and storage industry, with robots increasingly taking over various tasks. This transformation has significant consequences for the workforce employed in fulfillment centers, potentially leading to lower wages and less job security. Furthermore, the impact of this shift extends beyond the labor market, affecting employment rates, economic growth, and income distribution.

The Cybernetic P2P Fulfillment Model

The proposed solution to address the challenges posed by automation in fulfillment centers is the Cybernetic P2P Fulfillment model. This model introduces a new ownership and investment approach to mitigate the potential negative impacts of automation. It aims to distribute machine ownership rights and investment opportunities across the CEIS network of Smart e-businesses, ensuring a fair and decentralized distribution of profits.

One unique aspect of this model is the inclusion of Consumer Syndicated Funds (CSFs), allowing consumers to invest in machine time through their Smart e-businesses. This approach expands the economic benefits of machine ownership to a broader range of stakeholders, helping to minimize the adverse economic consequences of automation. The model's focus on a more equitable distribution of profits aims to address concerns related to income inequality and the diminishing bargaining power of workers in the warehousing and storage industry.

Resource Allocation Model

The Cybernetic P2P Fulfillment model provides a unique investment framework for fulfillment centers to encourage decentralized ownership and community empowerment, with a focus on mitigating the potential negative economic impacts of automation by ensuring profits are distributed in an equitable and decentralized manner.

To optimize resource allocation strategies, the model employs a formula that takes into account several key variables. The total machine time available for investment (X) is divided into N machine time slots, each representing one hour of machine time. The machine output per hour (Y) is the sum of the machine's maintenance cost, wages paid to workers associated with the replaced human labor, and the profits earned by the fulfillment center.

The formula for machine output per hour (Y) is represented as follows:

$$Y = MC + W + P$$

For instance, consider the case of CSF A, which invests in the Cybernetic P2P Fulfillment model. Let's assume that the investment made by each investor in the investment pool is \$0.20 per hour, and the total investment pool for the CSF is \$2.00 per hour. Therefore, the percentage of investment made by each investor can be calculated as follows:

$$P_i = (I_i / I_t) \times 100$$

where P_i is the percentage of investment made by each investor, I_i is the amount invested by the investor, and I_t is the total investment pool. In this case, $P_i = (\$0.20 / \$2.00) \times 100 = 10\%$.

Furthermore, let's assume that the associated wage paid to workers associated with the replaced human labor is \$14 per hour. Therefore, the total return to be divided among the investors is equal to the associated wage, which is \$14 per hour. Thus, the total return can be calculated as:

$$TR = AW \times T$$

where TR is the total return, AW is the associated wage, and T is the machine time invested. In this case, $TR = \$14 \times 1 = \14 .

Using the above formulas, the e-business return per investor can be calculated as follows:

$$ER_i = (P_i \times TR) / T$$

where ER_i is the e-business return per investor. In this case, $ER_i = (10\% \times \$14) / 1 = \1.40 .

Therefore, for each investor who invested \$0.20 per hour in the CSF, the e-business return is \$1.40 per hour.

Conclusion

In summary, the Cybernetic P2P fulfillment model offers a promising solution to address the negative economic impacts of automation in the warehousing and storage industry, as well as offering new and significant economic benefits to the public. Its implementation ensures fair and decentralized distribution of profits by disseminating ownership rights and investment opportunities among a network of stakeholders. The model could help to reduce costs and increase the availability of goods and services, thereby stimulating consumer spending and driving economic activity. By promoting decentralized ownership, community empowerment, and equitable distribution of profits, the CEIS' P2P fulfillment model has the potential to benefit workers, communities, and the broader economy.