

## **Assignment - Oral Presentation**

**Key Change Drivers of Digital Transformation –  
Cloud Computing in Human Resources Management**

## Reason for digital transformation of Human Resource?

- ▶ **Increased Efficiency:** No heavy workloads, minimize mundane, efficiency to overall work processes
- ▶ **Data accuracy Improvement:** As workloads decrease, the probability of making mistakes also decreases.
- ▶ **Cost-efficiency improvement:** Reduces human effort and allows you to reduce time but also allows you to focus on more core business strategies

As human resources undergoes digital transformation, cloud-based HR management is becoming a widely adopted solution for enhancing the efficiency of HR functions within organizations. Cloud-based HR management offers a broad range of HR management activities. Through cloud-based HR management, we can effectively manage various aspects of HR management (Datta, A. et al. 2012).

# Cloud Computing

The definition of Cloud Computing from National Institute of Standards and Technology (NIST) (Mell, P. and Grance, T., 2011) are as follows:

- ▶ Convenient and ubiquitous access to a shared pool of configurable computing resources through on-demand network access
- ▶ Resources can be quickly provisioned and released with minimal effort and interaction with service providers.
- ▶ The cloud model encompasses five essential characteristics:
  - On-demand self-service
  - Broad network access
  - Resource pooling
  - Rapid elasticity
  - Measured service

# The Effects of Cloud-Based HR Systems on Payroll Management

(A) Flexible and Scalable (SK Sah, and SR Joshi, 2014):

- Cloud computing offers flexibility and scalability. Companies can quickly scale up or down the resources of the payroll management system based on their needs..

(B) Cost-effectiveness:

- Many cloud-based HR systems are provided as a service using software as a service (SaaS) and cloud computing (S. N. Kumar and S. S. Kumar, 2014).
- Enterprises only pay for the resources they actually use, avoiding the cost of purchasing and maintaining expensive hardware.
- Enterprises can also reduce related labor and time costs.
- Advantages in automation and data centers. Automated tools can be used to process employee payroll data, reducing manual operations and the use of paper documents.
- Data centers provide safe and reliable data storage and backup, reducing the cost of building and maintaining data centers for enterprises.

(C) Efficiency and Convenience:

- Provides powerful data processing capabilities and high-speed network connectivity, accelerate human resource management processes and improve efficiency.
- Businesses can automate processes, provide convenient data access (X. L. Wang et al. 2016) and reporting functionalities.
- Offers remote access and collaboration tools, enabling HR teams to work more flexibly and efficiently.
- Companies investing in this type of technology can help it improve their productivity and performance (Barrales-Molina, V et al. 2015)(Ham, S., Gon Kim, W. and Jeong, S., 2005), .

## Case Study – Casetify

### CASETiFY

- ▶ Established in Hong Kong in 2011.
- ▶ Designing and manufacturing phone cases and electronic accessories, collaborating with numerous globally renowned companies and brands.

### Problems

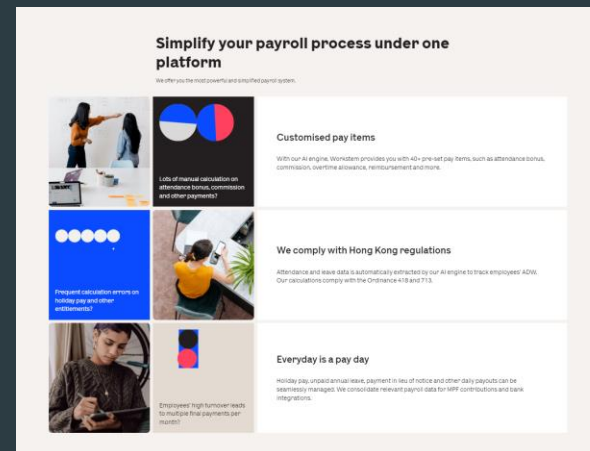
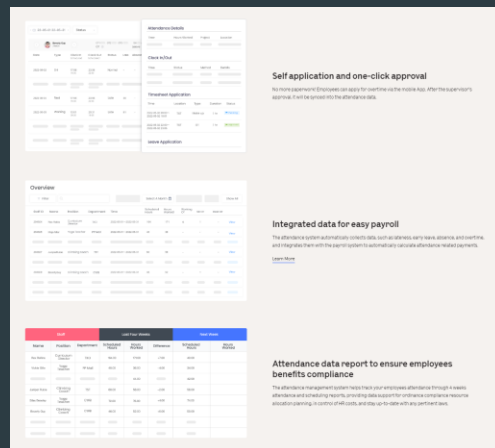
- ▶ During peak seasons, they employ many part-time workers who accumulate overtime, leading to time-consuming and error-prone processes of exporting attendance records and manually calculating data.
- ▶ Review and approval of overtime/leave applications consume a significant amount of time for supervisors and HR.
- ▶ Tracking employee Average Daily Wage (ADW) is difficult due to varying monthly working hours for hourly-rate employees, resulting in challenges when calculating statutory holiday pay. Furthermore, the high turnover rate among hourly-rate employees leads to frequent final pays and the constant need to track ADW.

**CASETiFY**

# Case Study – Casetify

## Solution

- SaaS type HR system provider (Workstem) simplifies attendance management by automating clock in/out tracking
- extracting attendance data such as overtime, leave, and absence.
- Conveniently apply for overtime or make-up hours through the mobile app, incorporated into attendance records after approval.
- System supports ADW calculations in compliance with the Employment Ordinance and offers a streamlined "final pay" calculation feature, reducing HR workload (Casetify (Workstem, 2023)).



## Key challenges for HR leaders to apply learnings into their real workplace

1. Security risks: Storing data in the cloud means relying on third-party service providers to protect its security. While these providers typically have strict security measures in place, there is still a risk of data breaches or being targeted by hackers (Rashmi, Sahoo and Mehfuz., 2013).
2. Availability issues: Depending on cloud computing services means relying on the availability and stability of internet connections. If there are network interruptions or server failures, it can affect the normal operation of the human resource management system.

## Key challenges for HR leaders to apply learnings into their real workplace

3. Dependency concerns: Once the human resource management system is deployed in the cloud, businesses become highly dependent on the cloud service provider. Contract issues, technological changes, or the service provider going out of business can pose challenges in terms of system migration or data portability.
4. Privacy issues: Privacy is a significant consideration when dealing with sensitive employee information in human resource management. Storing data in the cloud can raise privacy and compliance concerns, particularly when data is stored on cloud servers located across international borders.

## Recommendation

### ► Security risks:

- Choose reputable cloud service providers with a strong track record in security and data protection, such as ISO 27001(it establishes a framework of criteria for an organization's Information Security Management System (ISMS). An ISMS comprises a collection of guidelines, protocols, workflows, and technologies employed to control and mitigate an organization's risks) (J. M. Evang., 2022).
- Implement additional security measures such as encryption, multi-factor authentication, and regular security audits.
- Train employees on best practices for data security and ensure they understand their roles and responsibilities in protecting sensitive HR data.

### ► Availability issues:

- Have service level agreements (SLAs) in place with cloud service providers that define acceptable downtime and response times (Odun-Ayo, O. Ajayi and N. Omoregbe, 2017).
- Regularly test the system's resilience and have contingency plans in place to quickly restore operations in case of disruptions.

## Recommendation

### ► Dependency concerns:

- Conduct thorough due diligence when selecting a cloud service provider, considering factors such as their financial stability, reputation, and long-term viability.
- Include provisions in contracts that address system migration, data ownership, and exit strategies in case of termination or changes in the cloud service provider's offerings.
- Maintain regular backups of HR data and periodically test data portability to ensure it can be smoothly transferred to another platform if needed.

### ► Privacy issues:

- Understand and comply with applicable privacy laws and regulations, both in the country where the business operates and where the data is stored.
- Work with cloud service providers who have strong data privacy and compliance practices, including mechanisms for data protection and data residency options.
- Implement data access controls, encryption, and anonymization techniques to protect sensitive employee information (T. Jung et al. 2015).
- Regularly review and update privacy policies and practices to align with changing regulations and industry standards.

# CONCLUSION

Cloud-based human resource management systems offer convenience in storage and accessibility that can significantly enhance work flexibility and efficiency.

These systems also reduce the likelihood of errors by minimizing complicated tasks, allowing for more effective resource allocation, which can also decrease costs and improve employee satisfaction with the company.

The ability of service providers to perform maintenance and updates is also beneficial for businesses to adapt to changes in regulations or policies.

However, no system is perfect, security of company data as well as privacy risks remain areas for improvement in cloud computing. Company can now choose service providers that offer appropriate protections to mitigate these risks. Nonetheless, with technology constantly advancing, it is expected that these issues will gradually be addressed and resolved.

Q & A

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