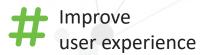
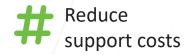


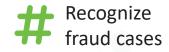
Practice Guide

Customer Identity & Access Management

Guideline for the implementation of C-IAM strategies and solutions.





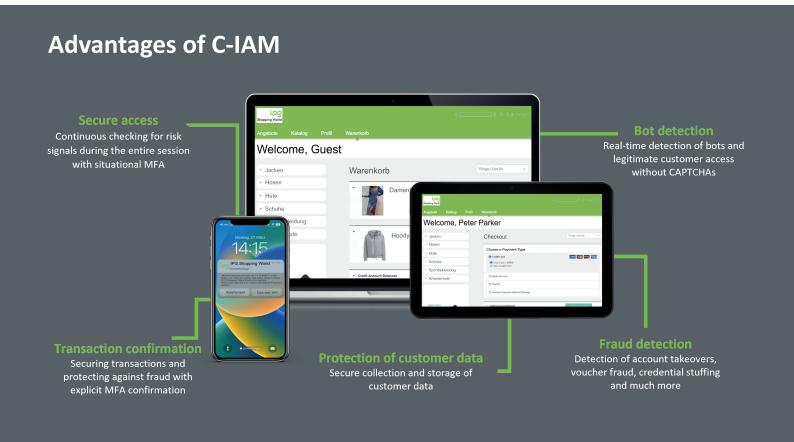


1. Introduction

C-IAM stands for "Customer Identity and Access Management". The main purpose is to help companies with managing customer accounts (identities) to provide customers a secure access to digital services and platforms.

C-IAM-solutions offer functionality for management of user registration, authentication, authorization, and access control. They enable companies to create and manage customer profiles, verify customer logins, offer single sign-on (SSO) for seamless login across different services, and protect customer data.

With C-IAM, companies can collect and analyze important data about their customers and create personalized offers and marketing campaigns. Thanks to enhanced user experience, companies strengthen trust and promote customer loyalty. By meeting the customers' needs and preferences, companies can increase their competitiveness and build long-term customer relationships.



2. Why is Customer Identity & Access Management important?

C-IAM helps companies to offer a seamless, safe and personalized user experience regarding digital platforms and services.

Improved user experience

With C-IAM systems, companies can provide their customers with a simple, fast and secure login to digital platforms and services. This leads to an enhanced user experience and increases the probability of customers coming back and using the companies' products or services again.

Protecting customer data

C-IAM systems help companies to manage and protect customer data. They enable a secure user authentication and authorization and help to avoid fraud and identity theft. Through the implementation of C-IAM, companies can ensure that only authorized users have access to their services and sensitive customer data is protected.

Personalized offers

By using C-IAM systems, companies can collect and analyze valuable data about their customers to develop customized offers and targeted marketing campaigns.

Compliance requirements

Companies are legally required to securely store personal data and to control access thereof. C-IAM systems support companies in meeting data protection and compliance requirements. That way, companies can avoid retrospective sanctions and fines.

Analysts opinion:

- According to a report by Markets and Markets, the market for C-IAM systems is expected to grow to \$1.5 billion by 2026, which represents an average annual growth rate of 15.1%.
- A report by Gartner predicts that by 2023, more than 60% of companies offering digital services will be using C-IAM systems to improve user experience and data security.
- A study by Janrain has revealed that customers tend to register with digital services and platforms that offer easy and quick registration. In fact, 95% of respondents said they would be willing to provide additional information about themselves if it helped to simplify sign-up processes.
- According to a report by Forrester Research, 86% of companies said they struggle to identify their customers across all digital channels. This underscores the importance of C-IAM systems, which help companies to manage the identity of their customers across different channels.
- A study by Ping Identity revealed that 83% of consumers are concerned that their personal information could be misused by companies. This shows that companies have a clear responsibility to ensure the protection of customer data in order to increase trust and loyalty from their customers.

3. Typical C-IAM functions

The following functions are provided in a C-IAM:

- Customer data management
- Registration and login
- Authentication and authorization
- Single Sign-On
- Profile management
- Self service

3.1 Customer data management

Customer data management in a C-IAM includes the collection, storage, management and analysis of customer data on digital platforms and services.

Collection of customer data

C-IAM systems collect data of customers who register or login to digital platforms and services. This data can include personalized information such as name, email address, phone number, address or demographic information for instance age, gender and interests.

Storage of customer data

C-IAM systems store customer data safely in a central database. It is important that these databases are protected and in compliance with data protection guidelines.

Management of customer data

The management of customer data in a C-IAM includes updating data, deactivating accounts and managing user privileges. It is important to ensure that only authorized persons have access to customer data.

Analysis of customer data

C-IAM systems offer functions to analyze customer data to identify customer behavior and trends. Such analyzes can be used to create personalized offers and marketing campaigns to strengthen customer loyalty.

Compliance with data protection guidelines

C-IAM systems must ensure compliance with applicable data protection laws such as the GDPR (General Data Protection Regulation) and to only use customer data for authorized purposes.

Integrations

The system can be integrated into other platforms and applications to ensure a seamless user experience and to synchronize data.

Reporting and analysis

The system can generate reports and analyzes about customer behavior and preferences to create personalized offers and marketing campaigns.

3.2 Registration and login

Registering new customers can be challenging. The processes are often complicated, time-consuming and can put off potential customers. The C-IAM offers a variety of functions that help to solve the customer registration problem.

Here are some benefits of a C-IAM:

Simple and intuitive registration

With C-IAM, companies can provide a user-friendly registration interface that simplifies the process for new customers. This lowers the barrier to registration and increases the likelihood that potential customers will complete the signup process.

Simplified registration

C-IAM offers a simplified login experience that streamlines the login process for users. Through C-IAM, customers can easily log in by entering their credentials once and then access different services and platforms. This saves users time and effort by not having to log in repeatedly. C-IAM facilitates login, thus providing a convenient and seamless experience for customers.

Social media integration

C-IAM allows customers to log in with their existing social media accounts, such as Google or Facebook. This significantly shortens the sign-up process as customers can leverage their existing credentials.

Multi-Factor Authentication (MFA)

MFA extends security by going beyond the two factors and using additional authentication methods. This can be biometric data such as fingerprints, facial recognition or iris scans. The combination of various factors further strengthens security and significantly reduces the probability of successful attacks.

Password management

C-IAM simplifies password management with convenient features such as password recovery and reset, the ability to set password policies and verify their strength, and integration with password management tools for secure storage and management. With C-IAM, customers can easily recover and reset their passwords while organizations can enforce strong password policies and ease the burden of password management. This improves the overall security and optimizes the user experience by simplifying the process of password management.

3.3 Authentication and authorization

Authentication and authorization are important features in a C-IAM as they ensure that only authorized users can access digital platforms and services.

Authentication:

Authentication involves the process of verifying a user's identity. This is usually done by entering credentials such as a username and password, or by using biometrics such as fingerprints or facial recognition.

Authorization:

Authorization is the process of assigning privileges to a user to access specific resources or functions. Authorization ensures that users can only access the resources for which they are authorized. This can be done through the use of roles or authorization groups.

3.4 Single Sign-On

Single sign-on (SSO) is a feature that allows users to sign in once and then access multiple digital platforms and services without having to sign in again each time. SSO thus improves the user experience and reduces the need to log into multiple services separately.

A C-IAM system can support SSO features in multiple ways e.g. by using standards such as OpenID Connect or SAML (Security Assertion Markup Language) or proprietary protocols. SSO basically allows a user to log in once to a central Identity Provider (IdP) and access multiple digital services provided by different Service Providers (SPs).

The SSO process is based on exchanging tokens between the Identity Provider and the Service Provider. After the user has successfully signed in with the Identity Provider, the Service Provider receives a token that confirms the user's identity. The Service Provider can then use this token to create a local session for the user without requiring the user to re-enter their credentials.

SSO is particularly useful for companies that provide different digital platforms and services and want to offer their customers a seamless experience without having to log in to each platform or service separately every time. A C-IAM system that provides SSO capabilities can help to improve user experience and increase customer loyalty.

3.5 Profile management

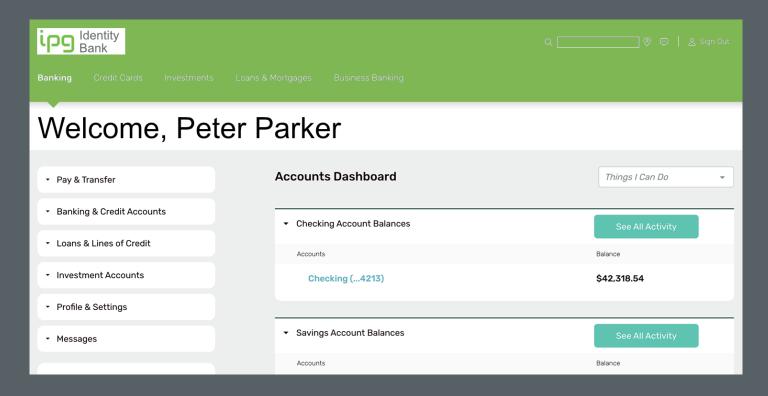
Profile management allows users to manage their personal information and preferences that they have provided when registering on various digital platforms and services. A C-IAM system thus provides the central platform for users to update their profile, regardless of which digital services they are registered with.

Profile information can vary widely and includes, for example, name, email address, date of birth, address, phone number, interests, preferences, purchase history, and more.

An important benefit of profile management in a C-IAM system is the ability to synchronize a user's profile across multiple digital platforms and services. When users update their profile information, the C-IAM system will automatically make the updated information available for all platforms and services where the user is registered. This keeps the users' profiles up to date no matter where they log in .

Profile management is also vital for personalizing services and improving customer loyalty. As companies learn more about their customers, they can provide personalized offers, recommendations and experiences that are in compliance with customers' needs and interests. By managing the profile in a C-IAM system users can themselves decide which information they want to share and which not, this strengthens the trust in the platform and increases data safety.

Secure data management



3.6 Self-service

The self-service feature allows users to perform specific tasks on their own without relying on the help of support teams or administrators. This reduces the companies expenditure and improves user experience.

It comprises e.g.:

- Password reset: Users can reset or recover their password in case they have forgotten it without relying on the help of support teams.
- Deactivating accounts: Users can deactivate or delete their accounts if they do not want to use it any
 more.
- Management of settings: Users can manage their notification preferences and other settings to customize their experience on the platform.
- Management of access rights: Users can grant or revoke access rights to certain applications or services.

Self-service features enable users control over their data, allowing them to manage their accounts and simplify adaption of personal settings. By providing these features, companies reduce their support costs while increasing customer satisfaction.

Check list for C-IAM

Best practices for the implementation of C-IAM solutions



Identify the requirements: Before you start implementing C-IAM, consider what features you need and what requirements you must meet. This requires an analysis of customer data, compliance requirements and security requirements.



Select a suitable solution: There are various C-IAM solutions available on the market. Select the solution that meets your requirements and supports your goals. Make sure that the solution can be integrated into your existing systems.



Develop a roadmap: Develop a roadmap to schedule and prioritize the C-IAMP implementation. Consider factors such as budget, resources and timeline.



Test thoroughly: Before implementing the C-IAM solution you should carry out thorough testing to ensure that it works properly and meets the requirements. Make sure you test different scenarios and ensure that the solution is scalable.



Training and support: Ensure that employees and customers understand the new C-IAM solution and can use it effectively. Offer training and support to ensure that customers and employees can use the solution effectively.



Continuous improvement: The C-IAM technology is constantly evolving. Make sure that you are continuously improving the solution to ensure that it always meets the changing demands and requirements of your customers.

Our experts will be happy to advise you. Please do not hesitate to contact us.

4. Selection and evaluation of providers

There are several factors to consider when choosing C-IAM solution providers.

Steps companies should take when choosing a C-IAM solution provider:

Requirements analysis

By describing functional, technical or security-related requirements in a structured procedure (RFI/RFP) by the providers, providers and solutions can be evaluated and compared.

Selection and evaluation of manufacturers

A list of C-IAM vendors that meet requirements based on functionality, scalability, security, integration, ease of use, compliance, cost, and support aids in selection and evaluation.

References and ratings

References and ratings from other customers as well as from independent analysts such as Gartner, Forrester and others underpin the selection.

Proof of Concept (PoC)

A PoC with the providers ensures that the solution meets the desired requirements and works properly.

Contract and Service Level Agreement (SLA)

Preparing a detailed contract and SLA with the selected provider allows both parties' expectations to be clearly defined and the services to be precisely set forth.

Training and support

The contract should also include training and support for the C-IAM solution to ensure employees and customers can use the solution effectively and receive support when needed.

By considering these steps, organizations can select a C-IAM solution provider that fits their needs and creates an enhanced customer journey for their customers.

5. Selection criteria for C-IAM solutions

Evaluating C-IAM solutions can be complex as there are many factors to consider.

Important evaluation criteria are:

Functionality

The C-IAM solution should provide all the necessary functionality to ensure seamless and secure identity and access management. The functions should also be flexible enough to adapt to the changing requirements and needs of the company and customers.

Security:

The C-IAM solution should provide a secure environment to protect identity and access management. This includes features such as two-factor authentication, multi-factor authentication, data encryption as well as risk assessment.

Scalability

The C-IAM solution should be scalable and able to keep up with the growth of the company and the number of customers.

Integrations

The C-IAM solution should integrate seamlessly with the company's existing systems and applications.

User-friendliness

The C-IAM solution should be easy to use and navigate to ensure a seamless customer experience.

Compliance

The C-IAM solution should meet the regulatory requirements applicable to the business, including GDPR, CCPA and other relevant regulations.

Costs

The C-IAM costs should be appropriate and comply with the requirements and the budget of the company.

Support

The C-IAM solution should provide reliable and effective customer support to provide assistance when needed.

Implementation of a C-IAM at a glance



Orchestration

Seamless integration of the identity system and the applications e.g. via drag-and-drop Interface



Registration

Easy acquisition of new customers through simple and fast customer registration



Authentication

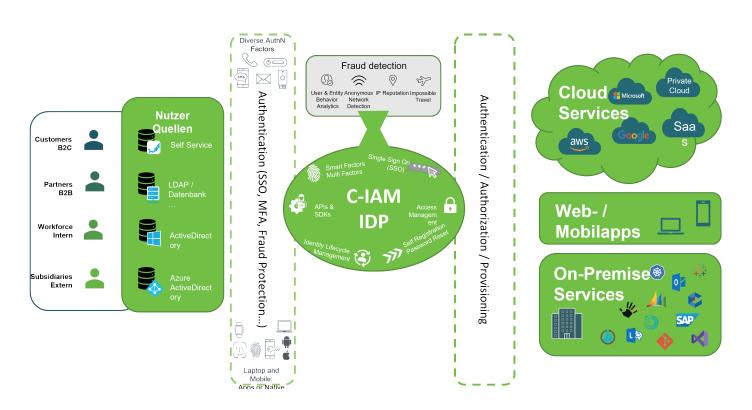
Secure access to any application and service with just one click



Multifactor Authentication

Easy protection of customer accounts with modern multifactor authentication methods

Example components of a C-IAM implementation



Summary and outlook

Together with the solutions of our manufacturer partners, we can offer a platform that unifies customer records, promotes the continuous maintenance of these records through self-service (progressive profiling) and transforms the customer experience into a simple and fast experience, so that customers like to come back.

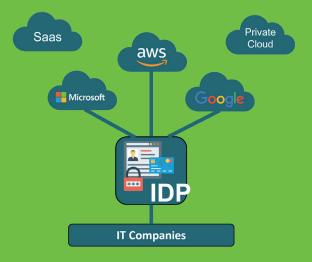
All of this while simultaneously raising security standards to state-of-the-art technologies. Old and new systems benefit from MFA (Multi-Factor Authentication), SSO (Single Sign-On), Dynamic Authorization, risk-based access management as well as bot and fraud detection.

Whether on-premise, cloud or hybrid services, with our C-IAM implementation, your applications benefit from state-of-the-art standards and features and can be continuously updated without tedious and complex distribution processes.

With our solution, we create a seamless omnichannel customer experience with a uniform look and feel and a consistent view of the customer's data. Customers always find their way around, have only one access and can use the latest passwordless or social login methods. This way, every customer gets exactly what he or she is looking for without any obstacles, at any time and quickly.

With a successful C-IAM you not only increase the satisfaction of customers and partners, it also enables you to significantly reduce support costs and increase sales.

A satisfied customer is a loyal customer and requires little or no support.



Should a support request be necessary, the time required for customer contact is also significantly reduced here, and unnecessary stumbling blocks (friction) caused by repeated access and identity queries are eliminated. This saves time and money by reducing these support efforts.

Notes

Increase customer satisfaction with C-IAM.

Please do not hesitate to contact us – we will help you to implement your project.





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