



HAGEN HÜBEL

Full-Stack Engineer, Technical Consultant, Interims-CTO

Berlin, Teltower Damm 159, Germany | Cell: (+49) 151-27010524 | Email: hagen.huebel@gmail.com

PROFESSIONAL SUMMARY

With over 30 years of experience in software development, I bring deep expertise in AI, BigData, FinTech, Blockchain, and eCommerce. As CTO and co-founder of an AI startup since 2024, I lead the development of advanced **machine learning** and natural language processing (**NLP**) systems, powering real-time content analysis, semantic search, and scalable microservice-based architectures.

My leadership background spans over a decade as CTO and includes prior roles as a team and developer lead. I've co-founded several **fintech** and **ed-tech startups** - one of which led to a successful exit - and consistently bridge technical execution with strategic business goals. I also have five years of experience in **mobile development** and continue to contribute actively to **open-source** projects, a commitment I've maintained since 2006.

Previously, I spent six years in the blockchain industry, where I developed Germany's first Smart Contract for Security Tokens under the eWpG (German Electronic Securities Act), which I presented to BaFin in 2021. This work involved close collaboration with legal teams and provided deep insight into **European compliance** and financial **regulation**.

My career reflects a passion for building innovative, resilient systems and fostering high-performing engineering teams in complex, fast-moving environments.

SKILLS

Software Engineering	Team Building	Neural Language Processing	Big Data
Vector Databases	Compliance	Regulated Environments	Company Building
Software Architecture	Machine Learning	Web3/Blockchain Development	Scalability

PUBLIC PROFILES

GitHub: <https://github.com/itinance>
Public Profile: <https://hagenhuebel.de>

LinkedIn: <https://www.linkedin.com/in/hagenhuebel>
Blog: <https://medium.com/@0xhagen>

WORK EXPERIENCE

CTO & Co-Founder

2024 -heute

infobud GmbH, Heidelberg/Berlin

- infobud.news is an AI-driven, **fully automated** news agent and news aggregator that simplifies global news by offering customizable feeds in all languages - delivering tailored insights into tech, finance, politics, and more. Four times a day, our **AI agents** write news articles based on the topics most relevant to you.
- As the Co-founder and CTO of Infobud.ai, I lead the architecture and development of the entire software stack, from machine learning models over natural language processing techniques to backend and frontend, while building and mentoring the engineering team. I have established a robust, scalable architecture and actively guide the team in handling complex data processing and big-data scenarios.



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CTO & Co-Founder

2021 - 2023

tokenforge GmbH, Berlin

- At TokenForge, I've led the growth of the Engineering Team from inception, personally increasing its size from a single developer to 15 dedicated professionals.
- In this role, I've also successfully set up a robust software architecture, and continuously educated the team on complex web3 and blockchain-related topics, thereby contributing significantly to our mission of creating an all-in-one software solution for tokenizing real-world assets.

WORK EXPERIENCE CONTINUED

CTO & Co-Founder

2020 -2021

FinTech in Switzerland, Exited in 2021

- As the foundational leader of the engineering team at an e-Money-based core banking system startup, I grew the team from the ground up to five engineers, successfully ensuring the timely release of our first software version in production. Our product, a reward-based payment system for eCommerce companies, was instrumental to the successful exit of the company within just one year.
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Engineering & CTO

2018 - 2019

Yair GmbH, Berlin

- At YAIR, I led the formation of the engineering team and successfully facilitated the release of our blockchain-secured, gamified platform for the new media art market in both Android and iOS app stores within a year.
- Our innovative application revolutionized the distribution, authentication, preservation, and trading of new media arts globally.

Founder, Engineering, Interims-CTO

2011 - 2018

ITinance GmbH, Düsseldorf, München, Berlin

- With proven expertise in developing blockchain products and token ecosystems on various chains including Ethereum, I've delivered innovative solutions for smart contract interaction and crypto-payment integration in eCommerce software, including the creation of our own token sale and distribution platform.
- My earlier experience includes building mobile applications and providing strategic consulting and software refactoring services for mid-sized organizations.

CTO & Co-Founder

2016 -2018

Zizzle eLearning Inc., Salt Lake City (USA)



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- As part of the BOOM startup cohort, I led the swift development of our application's backend and frontend, including the production of iOS and Android apps, all within a tight two-month period.
- In parallel, I successfully built a cohesive and effective engineering team of two.

Team Lead Engineering

2014 - 2015

Yatego GmbH, Munich

- As team lead for YategoLocal I was in charge of the engineering team and the development of App development as well the backend.

TECHNICAL SKILLS

Go	Solidity	Smart Contracts	TypeScript
NodeJS	Kubernetes	Relational Databases	PHP
Technical Due Diligence	DevOps	Infrastructure	AWS

PROOF OF WORK

Prominent pieces of my work

Software Architect and Full-Stack engineer at infobud.ai

2024

In early 2024, I architected and built the entire tech stack of infobud.ai from the ground up, covering backend, frontend, databases, vector handling, and machine learning components, including natural language processing models. As the engineering team continues to grow, I am transitioning more into a leadership role, drawing on my prior experience in leading high-performing teams.

Technology

Postgres, TimeScale, PostGIS/GIS, pg_trgm, pgvectors, Quadrant Vector Database, Python, Go, NodeJS, NextJS, NestJS, FastAPI, vLLM, Cuda, LLama3.1, Llama.cpp, Embeddings, Sentence Transformers

Technical Due Dilligence

2024

As a member of a technical expert advisory consortium, I had the privilege to support them specifically in the areas of Backend engineering, machine learning components and data storage during a technical due diligence of an AI-related company (EU). My particular activities included:

- Code Reviews / Auditing
- Interviews with the CTO
- Developer interviews
- Architecture assessment



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Co-Author and technical Architect of ERC-7570 and ERC-7551

ERC-7570: Security token interface for confidentiality and legal status transparency to crypto security tokens, according to eWpG. More Information can be found on the corresponding GitHub repository¹

ERC-7551: a Crypto Security Token Smart Contract Interface that fullfils legal requirements for security tokens.

This ERC was created in cooperation with the members of the German Federal Association of Crypto Securities Registry Administrators to comply with the requirements of the so-called German Electronic Securities Act (German: "Elektronisches Wertpapiergesetz" = "eWpG") and to establish a standard for Security Tokens that adhere to the law. More information can be found here².

My tasks in detail:

1. **Assessing Legal Compliance with Ethereum's Technical Constraints:** This task involved researching how legal requirements such as data protection, confidentiality, loss prevention, and authorized third-party transfers align with the limitations of the Ethereum Virtual Machine (EVM). The goal was to ensure that your Ethereum-based solution met relevant legal standards without being hindered by the technical constraints of the EVM.
2. **Investigating Cryptographic Requirements for the Authorization Model:** the focus was on identifying the necessary cryptographic elements that would be integral to your token's authorization model. This involved exploring various cryptographic techniques and algorithms to ensure secure and efficient authorization processes, particularly in the context of Ethereum's blockchain technology.
3. **Prototype Implementation:** this involved the development of Smart Contracts for the prototype, including libraries and interfaces that others could utilize as a foundation for further development.
4. **Developing Technical Components of an ERC Token Standard:** This task required to work on the technical specifics of the Ethereum Request for Comment (ERC) token standard. It involved outlining and coding the technical aspects such as smart contract functions, token properties, and compliance mechanisms that define how the token operates on the Ethereum blockchain.

SmartContracts + d'App for Security Tokens (eWpG)

2023

tokenforge GmbH / Chartered Investment AG

For TokenForge GmbH and its client, Chartered Investment AG & eSec, a registrar for Security Tokens, I wrote Smart Contracts and a corresponding d'App for the management and issuance of Security

¹ <https://github.com/ethereum/ERCs/pull/143>

²

<https://ethereum-magicians.org/t/draft-eip-erc-7551-crypto-security-token-smart-contract-interface-ewpg>



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Tokens on the Avalanche Blockchain in accordance with the German Electronic Securities Act ("eWpG").

My tasks in detail:

- Development of the Smart Contracts in Solidity (ERC20 + ERC1155 for Permissions according to eWpG)
- Development of the d'App for the issuance of shares
- Development of the d'App for the registry law
- Development of the snapshots for the registry excerpt

Technology:

Avalanche, SmartContracts, Solidity, ERC-20, ERC-1155, HardHat, OpenZeppelin, IPFS

More information:

- Announcement on Twitter ³ ([Link](#))
- BaFin - official record ⁴ ([Link](#))
- Press Release ⁵ ([Link](#))
- Contract Address ⁶ ([Link](#))

Avalanche SubNet for a custom EVM-blockchain

2023

tokenforge GmbH

Problem: facing difficulties acquiring test-tokens due to drained faucets on various blockchains such as Goerli and Polygon, my team and I frequently encountered obstacles during product testing, development, and demonstration. To circumvent these challenges, we decided to create our own EVM blockchain using Avalanche SubNets, providing us with robust Testnets to experiment with the deployment of SmartContracts, token interactions, and the minting of various token types, such as NFTs, SecurityTokens, and ReFi components.

Solution: Now we proudly manage our own chains, run our own faucet, operate our own block explorer via Blockscout, and, with immense gratitude to the open-source community, we even have our own SmartContract execution tool, which delivers a user experience surpassing that offered by Etherscan and its counterparts.

³ <https://twitter.com/0xhagen/status/1673690133579587586>

⁴ https://www.bafin.de/DE/PublikationenDaten/Datenbanken/Kryptowertpapiere/kryptowertpapiere_artikel.html

⁵ <https://chartered-investment.com/en/media/news/chartered-investment-und-smart-wealth-lancieren-ersten-tokenisierten-index-tracker-unter-ewpg/>

⁶ <https://snowtrace.io/token/0x99ba97acd811fbb19cd979e157642f24a1005c39>



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Technology

Avalanche, Go, EVM, SubNet, Blockscout, Kubernetes, DevOps

More information can be found here:

- Article on LinkedIn: "Why And How We Built Our Own Blockchain for effortless Building, Testing and Token Abundance" ⁷ ([Link](#))
-

SmartContracts + d'App for Tokenization of Carbon Credits

2022

Below2 (USA)

For tokenforge and our client, Below2 Inc. (USA), I wrote the Smart Contracts for the tokenization of Carbon Credits, which includes the actual tokens, a vault contract for the retirement of the Carbon Credits, and receipt tokens that are automatically sent back as a receipt for the deposit of the CO2 tokens.

In addition, along with our Web3- and UI team, we developed a d'App for management, the issuance of tokens, as well as for customer-side token retirement.

My tasks in detail:

- Development of the Smart Contracts in Solidity
- ERC20: Carbon Credits
- Custom: Vault Contract for the retirement of Carbon Credits
- ERC20 + ERC1155: Receipt Tokens
- ERC1155: Permissions for the issuance of the Carbon Credit Tokens
- Development of the dApp for the issuance of tokens
- Development of the dApp for the storage ("retirement") of Carbon Tokens

Technology:

Polygon, SmartContracts, Solidity, ERC-20, ERC-1155, HardHat, OpenZeppelin, IPFS

More information

- Below2 ⁸ ([Link](#))
 - the underlying suite of SmartContracts, that we wrote for such use-cases, can be found on GitHub⁹ ([Link](#))
-

⁷ <https://www.linkedin.com/feed/update/urn:li:activity:7065250683154747392/>

⁸ <https://below2.earth>

⁹ <https://github.com/tokenforge/carbonX-token>



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Technical Due Diligence - Cryptography & Blockchain

2022

Philips & Byrne

As a member of a technical expert advisory consortium supporting Philips & Byrne, I had the privilege to support them specifically in the areas of Cryptography and Blockchain during a technical due diligence of a crypto-related company. My particular activities included:

- Code Reviews / Auditing
 - Interviews with the CTO
 - Developer interviews
 - Architecture assessment
-

Tokenization Platform for Real-World Assets (RWA)

2021 - present

tokenforge GmbH

tokenforge is a Berlin-based technology provider that offers its customers a software toolkit for asset tokenization, that offers the possibility to tokenize assets compliant with the law, fully digital and with no code.

For Tokenforge and its clients, we developed an All-in-one toolkit for Security Token Issuance:

The Security Token Suite enables fast, legally compliant and secure issuance of bonds and digital securities:

- MiFiD II compliant underwriting process
- Fully automated token- and wallet generation
- Admin dashboard for efficient data- and issuance management
- eCommerce-like experience for investors
- Integration of KYC/AML, UBO and payment providers
- Stable and reliable token-minting experience
- Fully automated and scalable token issuance + transferability
- Automated token distribution
- API First Approach (Launchpad-API | Chain-API)
- Wallets as a Service (our own custody provider)
- Integration of external Custody-Providers

My tasks in detail:

- Software Architecture (Microservices)
- Team-Lead Engineering at the beginning, followed by a typical CTO-Role
- Software Development on all levels
- Large Databases (Postgres + TimeScale) for worldwide financial transactions
- Cryptography
- On-Chain-/Web3 development
- Backend engineering



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- Setup Infrastructure with DevOps

Technology:

Go, NodeJS, TypeScript, NestJS, PostgreSQL, TimeScale, SmartContracts, Solidity, PHP, Ethereum, Avalanche, Polygon, AWS KMS, Cryptography, Kubernetes, RabbitMQ, Redis, Prometheus, Graylog, Grafana, ERC-20, ERC-1155, ERC-721, BIP-32, BIP-44

SmartContracts + d'App for Security Tokens

2022

tokenforge GmbH / Greenrock Energy

For TokenForge GmbH and its client Greenrock Energy (Austria & Germany), I developed Smart Contracts and a corresponding d'App for the management and issuance of Security Tokens on the Polygon Blockchain in accordance with the German Electronic Securities Act ("eWpG").

My tasks in detail:

- Development of the Smart Contracts in Solidity (ERC20 + ERC1155 for Permissions according to eWpG)
- Development of the d'App for the issuance of shares
- Development of the d'App for the registry law
- Development of the snapshots for the registry excerpt

Technology:

Avalanche, SmartContracts, Solidity, ERC-20, ERC-1155, HardHat, OpenZeppelin, eWpG, GeSAct, IPFS

Information about the Project:

- Press Release ¹⁰ ([Link](#))
 - Article in Börsen-Zeitung ¹¹ ([Link](#))
-

Wallets As A Service / Custody Services

2022

tokenforge GmbH

For tokenforge, its clients and its *chain backend*, we developed *Wallet As A Service*: a scalable and secure set of wallet infrastructure APIs, enabling companies to create and deploy fully customizable, custodial on-chain wallets to their end users. Companies can offer their users wallets directly in their apps with onboarding as simple as a username and password. As another use case, custody providers can build their product on top of this tack stack, either as Cloud-service or *on-premise*.

¹⁰ <https://greenrock.energy/pm-gre-bond-two/>

¹¹ <https://www.boersen-zeitung.de/banken-finanzen/greenrock-lanciert-erste-gruene-anleihe-als-e-wertpapier-a63377a6-ac5d-11ed-96eb-7f4be6535413>



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Our "Wallets as a Service" allows clients to create and store multiple wallets in distinct vaults. Transactions are first signed within this trusted network before being sent to the blockchain. Key materials are securely retained within the trusted network, never leaving its confines. Advanced cryptographic methods, including key rotation and data key encryption, are employed for enhanced security.

My tasks in detail:

- System architecture & Secured Infrastructure
- Elliptic Curve Cryptography
- Lead Dev of wallet management and cryptographic principles
- Leading the engineering team

Technology:

AWS KMS, Go, TypeScript, NestJS, PostgreSQL, VPN, Elliptic Curves Cryptography,
Hierarchic Deterministic Wallets, BIP-32, BIP-39, BIP-44

SmartContracts + d'App for Tokenization of GmbH shares

2022

tokenforge GmbH / Acquaty GmbH

For tokenforge and our client, Aquaty GmbH, I developed Smart Contracts for the tokenization of GmbH shares, as well as for complex access permission models. In addition, I worked with our team of web specialists to develop a web app for managing all on-chain processes (d'App).

My tasks in detail:

- Development of Smart Contracts in Solidity
- ERC-20, ERC-1410
- Factory Contracts, Whitelisting Contracts, ACL + Permissions on-chain
- Access Control Management for different governance roles
- Development of the web front-end for token "minting"
- Development of the web front-end for managing whitelists on the Smart Contract and for managing different permission roles.

Technology:

SmartContracts, Solidity, ERC-20, ERC-1155, HardHat, OpenZeppelin, IPFS



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SmartContracts for various NFT-projects

2021 - 2022

tokenforge GmbH / multiple clients

For TokenForge GmbH and its clients, I continually developed Smart Contracts for various approaches revolving around NFT and utility tokens with full test-coverage. In addition, I developed a centralized backend to make the management of on-chain processes accessible via a REST API (keyword "Web 2.5").

My tasks in detail:

- Smart Contracts in Solidity based on:
 - ERC-20
 - ERC-721
 - ERC-1155
- Tools for minting tokens
- Tools for managing metadata and files on IPFS
- Image processing/manipulation for generative Art using Puppeteer and ImageMagick

Technology:

SmartContracts, Solidity, ERC-20, ERC-1155, IPFS, HardHat, OpenZeppelin, ImageMagick, Sharp, Image Manipulation, Generative Art, NFT, Docker, Puppeteer

Electronic Securities on Ethereum according to eWpG

2021

tokenforge GmbH / Chartered Investment AG

For Chartered Investment Germany GmbH, Düsseldorf, Smart Contracts and necessary web applications were developed for a digital security on the Ethereum and Avalanche Blockchains, in accordance with the Electronic Securities Register Act.

The collaboration took place in close coordination with the law firm Lindenpartners, Berlin, to align with the requirements of BaFin and to consider all regulatory aspects.

Proof: <https://etherscan.io/address/0x114b42adaa9381b6c60cc408c8b261afa7bcdeac>

My tasks in detail:

- Conceptual collaboration regarding the interpretation of eWpG in terms of technological possibilities and constraints in the Ethereum protocol Development of Smart Contracts
- ERC-20 based Smart Contracts
- ERC-1410 based Smart Contracts
- Factory Contracts + Whitelisting + Blacklisting
- Access Control Management for different governance roles
- Development of the web front-end for token minting
- Development of the web front-end for managing the whitelists on the Smart Contract and for managing different administrative roles



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- Development of a backend for the registry management and determination of token balances per investor's wallet
- Close cooperation with lawyers in favor of regulatory guidelines

Technology:

SmartContracts, Solidity, ERC-20, ERC-1410, HardHat, OpenZeppelin, Quasar, TypeScript

More Information:

- Article in the Press ¹² ([Link](#))
-

Technical Due Diligence - CEX

2021

Philips & Byrne

As a member of a technical expert advisory consortium supporting Philips & Byrne, I had the privilege to support them specifically in the areas of FinTech and Blockchain during a technical due diligence of a well-known cryptocurrency exchange. My particular activities included:

- Code Reviews / Auditing
 - Interviews with the CTO and CEO
 - Developer interviews
 - Architecture assessment
 - Security assessment around wallet management and blockchain interaction
-

Technical Due Diligence - FinTech/Hyperledger

2021

Philips & Byrne

As a member of a technical expert advisory consortium supporting Philips & Byrne, I had the privilege to support them specifically in the areas of Cryptography and Blockchain during a technical due diligence of a FinTech building with Hyperledger. My particular activities included:

- Code Reviews / Auditing
- Interviews with the CTO
- Developer interviews
- Assessment regarding HyperLedger/Swiss Trust Chain and their Chain Code

¹² <https://www.btc-echo.de/news/chartered-investment-begibt-kryptowertpapier-auf-ethereum-130928/>



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eMoney Payment Gateway API, weeCommerce AG

2020

ITinance GmbH / weeCommerce AG

As a joint project with our client weeCommerce AG, we created a Payment Gateway that can handle the complete payment processing within the framework of a WhiteLabel Banking System. The following features are provided within a REST API:

Features:

- Account opening for both private and business customers (Europe-wide)
- KYC (Know Your Customer)
- UBO (Ultimate Beneficiary Owner Check)
- Deposits of credit into internal eMoney-based wallets
- Withdrawals of credit to bank accounts via IBAN
- Transactions between wallets
- Bulk transactions between different wallets as individual transactions
- Credit Card Payments including 3DSecure

My tasks and responsibilities:

- Team Building
- Development of the entire software architecture and the final technology stack
- Technical Product Owner
- Development of the banking engine and the REST-API in Go
- Team coordination in collaboration with other developers
- Planning and coordination of peripherals (dashboards, monitoring, recovery)

Technology:

Go (Backend, Services, REST-API), nats.io (message bus), ProtoBuf (data layer / protocol), PostgreSQL, Prometheus, Grafana, GrayLog / Elasticsearch, Traefik, KeyCloak, Kubernetes, ReactJS for Admin-Dashboard

SaaS Platform „Blockchain Snapshot as a Service“

2019

ITinance GmbH

During the development of our STO launchpad (see below), the so-called snapshotting of the EVM blockchain for dividend or interest payments turned out to be a by-product that we will separate out and market as a separate product in the future.

My tasks:

- Programmatic implementation of "snapshotting" for requested tokens on the Ethereum blockchain in general.
- Database scheme for time series and big data based on Timescale-DB and PostgreSQL
- Writing PostgreSQL Extensions for this kind of data
- History of token transfers



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- REST API
- Own payment system for Bitcoin and Ether payments
- Connections to other banking interfaces for automatic payment of dividends
- Admin dashboard for managing customer data and payments, invoices, etc.

Technology:

Go, EVM, Ethereum, PostgreSQL, REST, Swagger, BigData, TimescaleDB

Research Project Ethereum '19

2020

German Car Manufacturer (NDA)

Blockchain Research and Development Project in the Independent Automotive Aftermarket (NDA protected).

Features:

- Consulting around Smart Contracts on the Ethereum Blockchain.
- Development of smart contracts with Solidity
- Research of feasibility of the use-cases with regards to Web3-UX and Gas Fees
- Backend + REST API for OnChain operations.
- Gas Fee simulation
- Optimization of smart contracts in terms of memory consumption and fees
- Interaction with the SmartContracts via Web3.js into an existing Angular application

Security Token Offering, Smart Contracts and Token Distribution

2019

Palmtrip GmbH

Palmtrip GmbH would like to issue a Security Token with BaFin-Approval. The Security Token will be a regulated security with its own WKN/ISIN. Via the token, dividends will be distributed annually to the token holders via snapshot. Regulatory requirements on the part of BaFin require a special design of the token contracts with regard to transferability. So-called Oracle techniques are used here to link the on-chain world with the off-chain world.

My Tasks:

- Test-driven development of SmartContracts based on the umbrella standard for security tokens according to ERC 1411 (formerly ERC 1400)
- Token Sale & Distribution dApp
- Distribution platform for token acquisition, investor management and dividend payments
- Consulting around token design in coordination with the lawyers involved regarding legal and technical feasibility
- ERC-20 backward compatible
- Whitelisting for token transfer
- ERC-1594: Core Security Token Standard
- ERC-1410: Partially Fungible Tokens
- ERC-1643: Document Management Standard



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- ERC-1644: Controller Token Operation Standard
- Use of Oracles for injecting off-chain KYC into Token Transfers
- Integrated crypto-payments
- Fiat payments via external Payment providers
- Solarisbank Integration
- Uploads of legal documents to IPFS and deposit of hashes in the SmartContracts per token purchase as part of a partitioning process

Initial Token Offering (ICO), Smart Contracts and Token Distribution

2019

IRON Eagle Capital GmbH

Development and technical preparation of Iron Eagle Capital GmbH's ICO for the in-house Nuco cloud and the NCDT token.

URL: <https://nuco.cloud>

Smart Contracts: <https://github.com/nucocloud/ncd-token>

Etherscan: <https://etherscan.io/token/0xe0c8b298db4cffe05d1bea0bb1ba414522b33c1b>

My Tasks:

- Teambuilding legal framework (external via Lindenpartners/Berlin)
- Development of the Token Sale and Distribution dApp
- Integration of Affiliate programs / bonus programs with multiple levels
- Technological whitepaper support
- Training and ongoing advice to the founding team on blockchain-related topics and on the technicalities of an ICO
- Distribution platform for token acquisition and investor management
- Supporting the Design of the token economy
- Integrated crypto-payments
- KYC/AML via Fractals
- Fiat-Payment via Micropayment



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CTO - YAIR GmbH (Crypto, NFT)

2018 - 2019

YAIR GmbH, Berlin

Founded in 2016, the startup YAIR secures the access and value of digital artworks through blockchain technology, making digital art accessible and tradable for the art market.

My tasks & responsibilities:

- Ongoing technical consulting of the team and software development around Blockchain, SmartContracts and the upcoming STO (Security Token Offering).
- Project planning with the team and investors
- Development of the SmartContracts (ERC-721, ERC-20, ERC-1400), backend, marketplace and mobile apps with Flutter (cross-platform iOS & Android).
- Leading the development of the token sale platform:
 - User management
 - Artwork management
 - Affiliate program / bonus program with different levels
 - Token Sale, payment & distribution
 - Payment-Methods: ETH, BTC, Aeternity-Token
 - Planning and leading the development of the digital art trading platform
 - VR app with display connectors to external devices such as Samsung Frame and other VR headsets.

Technology Stack

- Backend:
 - Symfony, Sylius, Doctrine, API Platform, Swagger
 - Docker, Kubernetes
- On-chain:
 - Ethereum
 - Aeternity-Blockchain
 - IPFS, Storj
- Mobile:
 - Flutter / Dart
 - ReactNative (MVP, migrated to Flutter)
 - BLOC, Reactive Programming
 - Unity3D
 - Vuforia
 - ChromeCast
- AWS
 - EC2
 - S3, Cloudfront

More examples can be found in th Appendix



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APPENDIX

WORK EXPERIENCE before 2013

Senior Software Engineer Backend

2013 - 2014

Yatego GmbH, Munich

I was part of the refactoring team where the whole software stack of Yatego's eCommerce platform www.yatego.com (opens in a new tab) has been rebuilt.

Software Engineer Backend + Web Development

2011 - 2013

Amakura GmbH, Cologne

With a team of 6 developers we built a web-based ERP software for the insurance sector.

CTO / Lead Dev, Medolan UG

2011 - 2012

medolan UG, Meerbusch/Duesseldorf

As the leading software developer for this eHealth Startup based in Düsseldorf (Germany) I was responsible for the development of the whole software stack.

Software Developer (ASP.Net)

2008 - 2011

Chronocycle Solutions GmbH, Duesseldorf

With a team of 6 developers we built a web-based ERP software for the insurance sector. Besides the integration of finance-related interfaces and data imports like MT940 and DTAUS, I was responsible for performance optimizations, for both frontend and backend, particularly the Microsoft SQL Server database.

Web Developer Marketplace

2005 - 2007

Sedo GmbH, Cologne

I was a member of the web application development team and amongst other things responsible for the development of the real-time auction system and several backend tools.

Software Developer

1998 - 2005

LECTOR Computersysteme GmbH, Cologne