

AVINOC is a consistent, integrated, decentralized, transparent and permissionless functional base data layer in the form of a Blockchain for the aviation industry. It can be used by all participants in aviation, like passengers, airlines, business aviation (BizAv) operators and all edged suppliers to e.g. book flights and manage all processes within their organizations in an efficient and cost effective way.

AVINOC has been designed to achieve optimal utilization and reduce costs significantly. It has the capability to connect all participants of the aviation- and travel industry to make the interconnected customer journey become a reality.

It is our vision to solve the serious, structural, processual and daily business problems of the aviation industry.



The Project

focuses on **Aviation** which covers the worldwide civil transportation of persons and cargo with airplanes or helicopters. The Aviation business can be divided into the General Aviation (GA) with its two branches, **Business Aviation** (BizAv, corporate and executive aviation) and Private Aviation (private flying and clubs), as well as the regular **Airline** and **Charter** business.

Managing all the information-flow requires intermediaries (like brokers, platforms or the GDS) functioning as a kind of communication interface between all participants (customers, operators, airlines, travel agencies). Such systems tend to be highly complex, laborious, time consuming and very expensive and can only be adapted and expanded for future needs with great efforts. Direct bookings and communication between end consumers and suppliers are basically impossible or need additional efforts because of the immanent systemic property of separating participants from each other. Intermediaries hereby create their right to exist.

AVINOC provides out of the box Blockchain technology paired with agile digital services as an enablement layer for generating innovative digital touch points. It's a generic, permissionless and aviation business specific solution. Connecting your existing systems like ERP with AVINOC and using artificial intelligence, conversational UI with NLP and knowledge graphs, generates new values. Price comparison, traveler- and operational services, automated check-ins and payments in one platform reestablish the customer's and partner's lost empowerment. By connecting the aviation-specific Blockchain ecosystem, AVINOC and its digital enabler SAP Cloud Platform, create the basic foundation for high-speed innovation projects for all parties in the ecosystem of aviation.



AVINOC Ltd.
Unit 1102 11/F, 29 Austin Road
Tsim Sha Tsui, Kowloon, Hong Kong
E-mail: office@avinoc.com
Web: www.avinoc.com

Contact Partner Europe

Körösstraße 21
8010 Graz, Austria
Phone: +43 663 03231616
E-mail: office@avinoc.eu
Web: www.avinoc.eu

Social Media

- youtube.com/avinoc
- twitter.com/AVINOC_ICO
- facebook.com/avinoc.org
- linkedin.com/in/avinoc-ico
- reddit.com/r/AVINOC
- t.me/AVINOC
- medium.com/@AVINOC_ICO

© 2018 AVINOC Ltd., HK No. 2700628,
All contents apply unless mistakes and modifications.
Folder Version 2.0 25.09.2018

Team

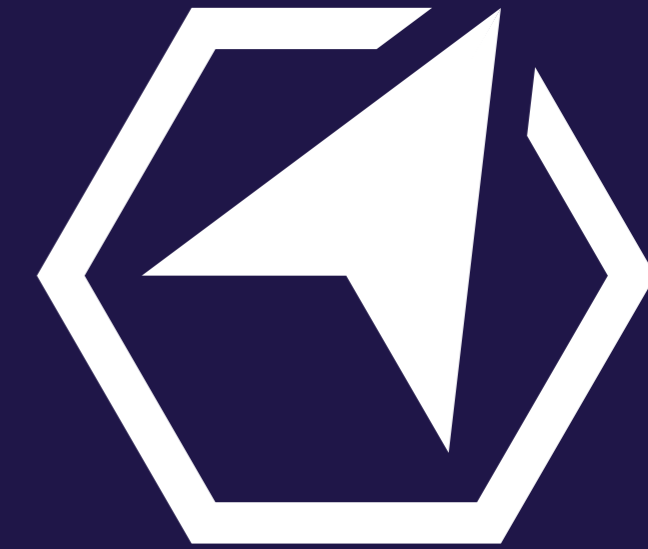
Out-Of-The-Box thinking and combined experience in IT, Blockchain/crypto, aviation, business development, SAP, Finance, PM, RE, QM in one smart and international management. Together we can rely on far more than 200 years of IT and aviation experience as well as experience in blockchain technologies since 2011. For updates of the team please visit our website www.avinoc.com/team.

- | | |
|---------------------------|---|
| Robert Galovic, BSc. MSc. | Organisation & Business Development, PPL |
| Karl-Heinz Mali | Aviation Business Analysis, ATPL, Instructor & Examiner |
| Rene Inkret | Aviation Logistics & Planning, ATPL |
| Mag. Gernot Winter | CFO, Finance, Investments & Legal |
| Mag. Shayda Osman | Sales & Investor Relations (Middle East) |
| Peter Skerl | CTO, Blockchain-Technology |
| Mag. Petra Peinsitt | Marketing & Public Relations |
| DI (FH) Florian Hye | Aviation & Quality Assurance, ATPL |
| Jakob Hohenberger | Product Development & AI |
| Hong Song Jie, MBA | Sales Agent for China & Canada |
| Ing. Michael Linder, MSc. | Chief Information Officer & Operations |
| Mag. Patrick Sadovnik | Sales & Investor Relations (Asia) |
| Mag. Robert Schwertner | Public Relations & Key Note Speaker |
| Mag. Jörg Vogeltanz | Artdirector & Media Management |
| Naveed Syed, MSc. MBA | Strategic Advisor & Investor Relations |

Aviation Challenge Finalist



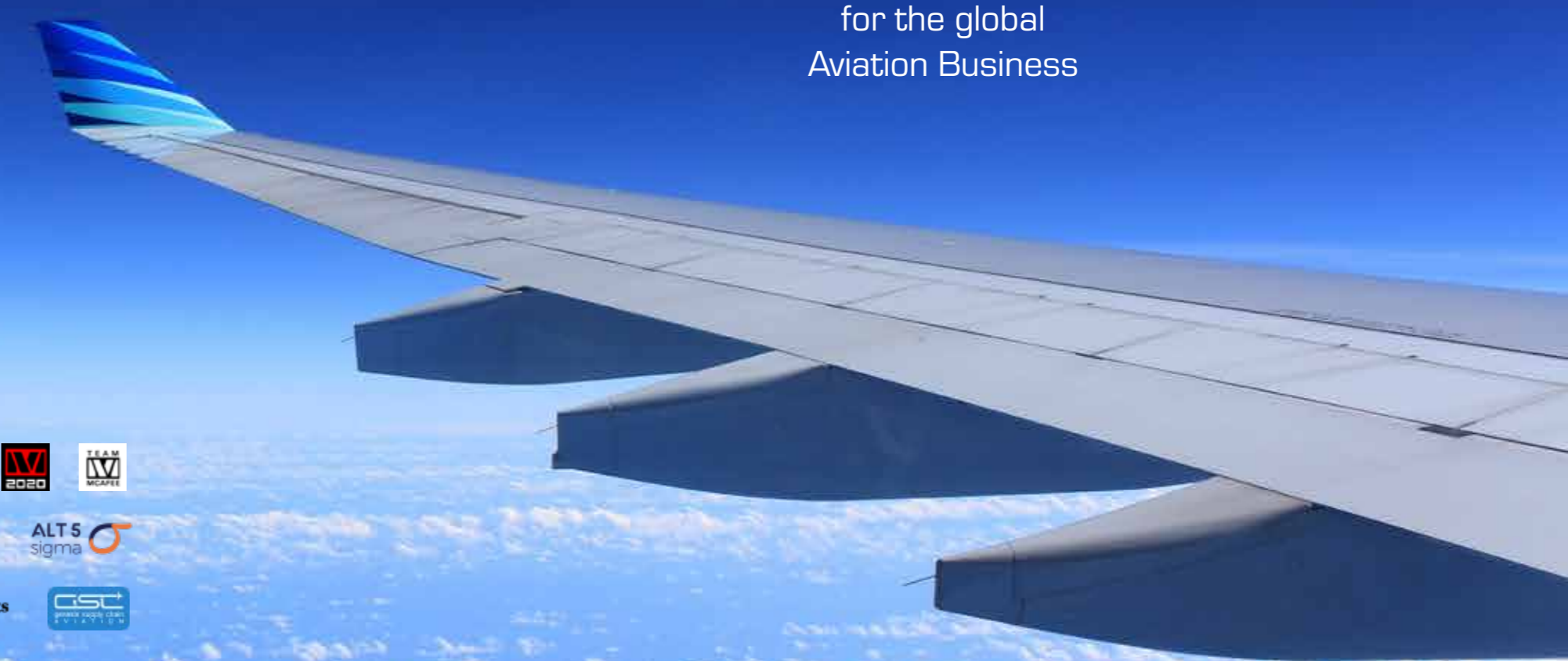
Aviation, IT & Media Partners



AVINOC

Aviation Network Operation Chain

The Blockchain Solution
for the global
Aviation Business



Intermediaries & Information

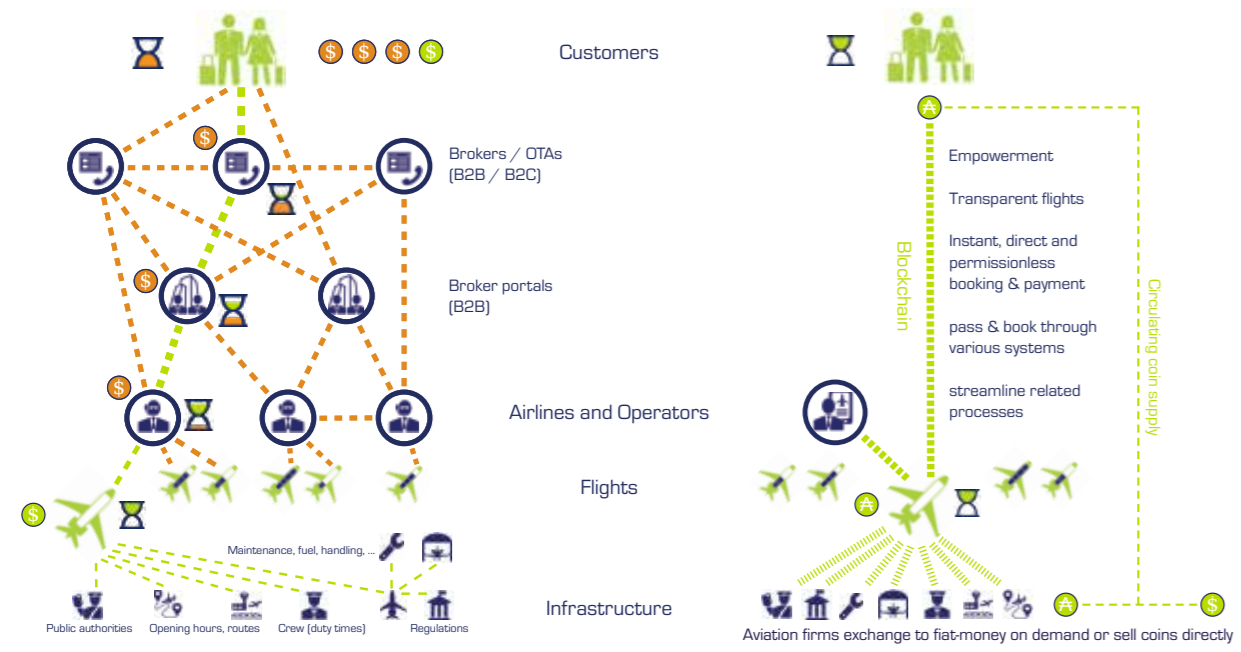
- incomplete communication and processes
- **access restrictions** (B2B, B2C)
- lack of information, no consistent data and **low reliability** of data
- many different systems with a high grade of complexity
- **more than 50%** of BizAv-flights offered through brokers are **not feasible** or fit customers' needs
- high demand for **manual coordination**
- **complicated** communication structures
- extremely **time-consuming** and **high costs**

Solution

- + **blockchain**
- + **decentralized** and **permissionless**
- + **no intermediaries**
- + complete **automation**
- + concentration on core business and significant reduction in administrative burdens
- + **direct booking** by customers/passengers
- + **cost reduction** up to **75%**
- + **enabler** for future technologies e.g. autonomous air taxi, drones for transportation or ground-effect vehicles

Processing of orders and gathering of information needs to be done manually via e-mail, telephone and fax

Direct booking and empowerment of customers enabled by the availability of all data



AVINOCoin and its utilization

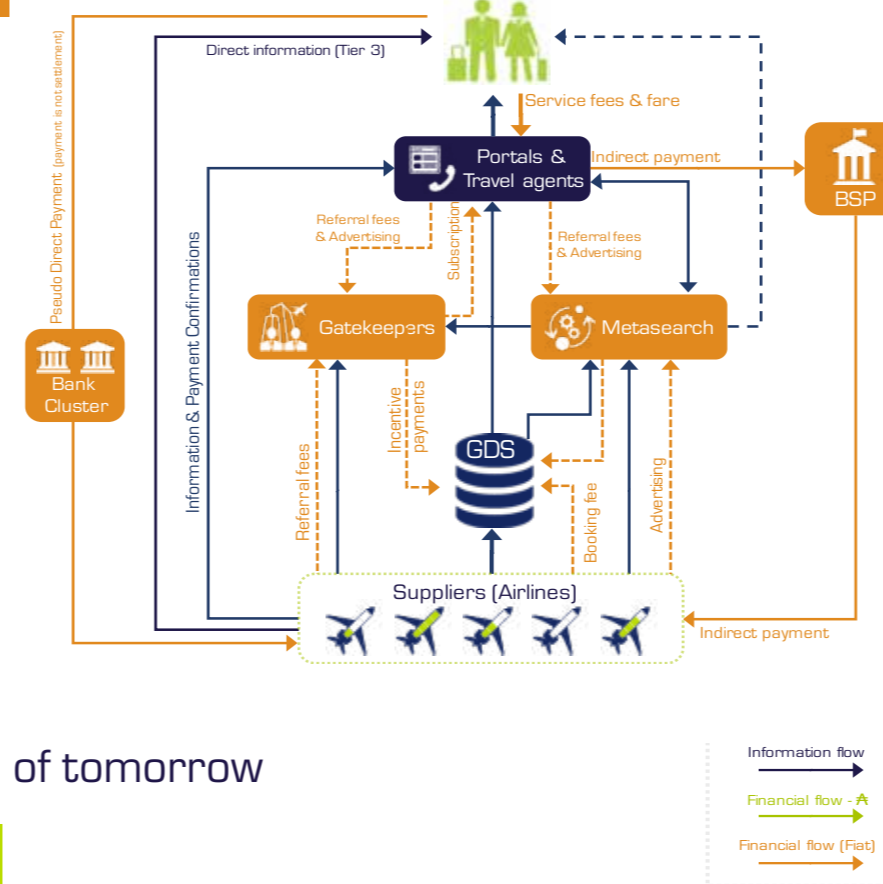
The **AVINOCoin** is the operating resource, the "fuel" of the blockchain solution. It ensures the integrity of data. The coin will be used for every writing process on the blockchain, e.g. for publishing flight offers, for booking and for setting up a smart treaty procurement (contract). Furthermore the coin is a payment means used to pay for tickets, crews, fuel, airport fees and a lot more. The coin will be traded decentrally on exchanges and is circulating globally. Airlines, operators, travel agencies and suppliers in the aviation industry or further third party firms can integrate **AVINOC** permissionless into their systems and apps, maximizing the value of their solutions. After the launch of **AVINOC** and with market growth, the utility value as well as the value of the coin itself will continually grow.

[compared to token economic models, growth rate and global turn over]

Global Distribution System (GDS) - today

Complex network and intermediaries, high efforts for future adoptions

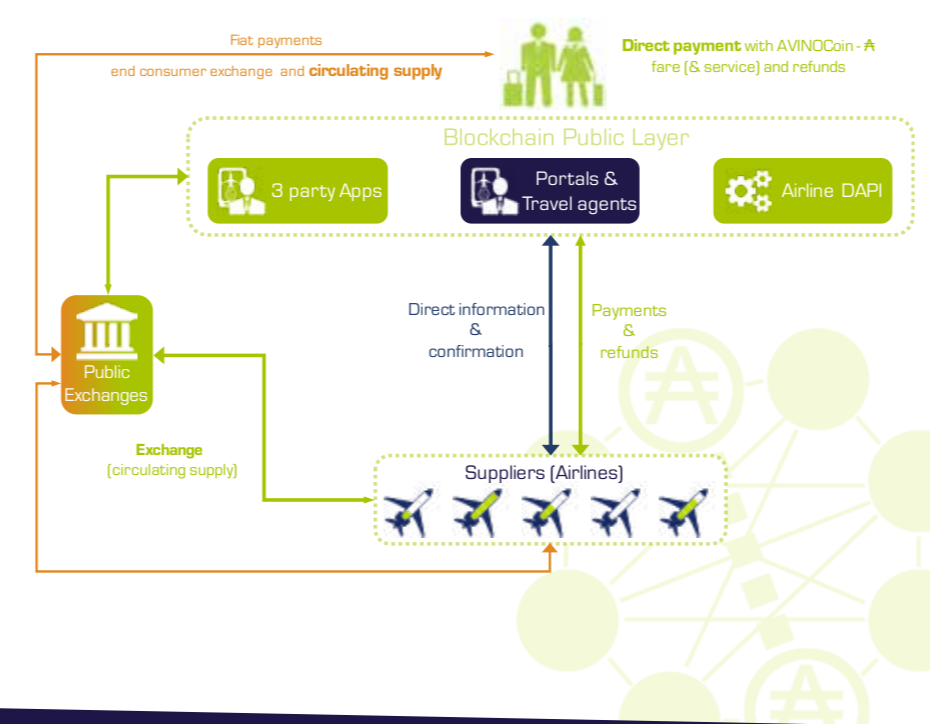
- **strong market pressure increase** from suppliers & consumers
- **intermediaries** (GDS, travel agencies, booking platforms) are the dominant players. interrelationships between them can vary.
- many **different systems** and **high grade of complexity**, complicated communication structures (Tier 1 - 3 issues, TAs)
- **significant consolidation** (only 3 big global players)
- no pass & booking through (e.g. to BizAv or emerging markets, high adoption efforts and costs for infrastructure)
- incomplete communication and demand for manual coordination and correction
- insufficient customization



AVINOC - The Airline system of tomorrow

Direct communication, booking and payment - permissionless & sustainable

- + **all relevant data** (flights/ infrastructure/ crews/fuel/airport handling ...), interconnected by Blockchain and DAPIs, fast and without restrictions
- + **direct communication** and no access restrictions (B2C & B2B)
- + **direct access to customers** & the BizAv without intermediaries (pass through)
- + **direct booking** by the consumer (empowerment)
- + significant reduction in administrative burdens and serious cost savings within the system (revenue)
- + enabler for complete automation and future technologies & systems
- + concentration on core business, less adoption efforts, high scalability & customization



Empty legs & Unused capacity

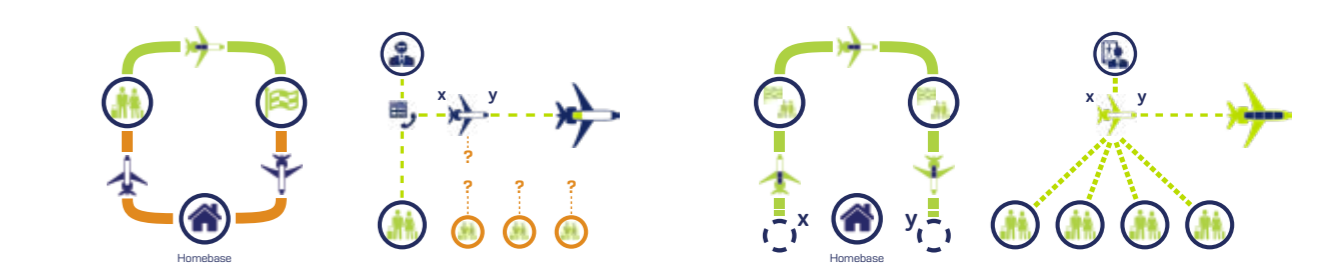
- almost **no** consistent, reliable and up-to-date **information source** regarding capacities and availabilities of aircrafts, fuel, crews, infrastructure and possible passengers on a global scale
- insufficient predictability
- **inappropriate** customer service, many cancellations and a large number of not feasible flights
- **40% of all flights** globally are **empty**
- **60% of all flights** globally are **underutilized**
- no possible improvement with current opportunities

Solution

- + **blockchain** - **consistent, permissionless and integrated** global base data layer
- + **decentralized and transparent**
- + **worldwide** coordination of all market participants
- + **optimal utilization** of crews and aircrafts, infrastructure and staff on ground
- + significant **reduction of costs**
- + **save** and feasible **flight offers**
- + **direct booking** by customers
- + **new, sustainable business models** can be tapped

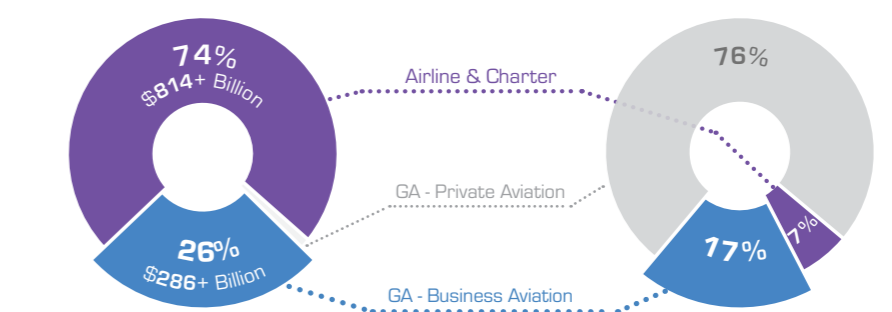
Low utilization and high costs due to the lack of reliable data and the lack of information about possible fellow travelers

Ensured optimal utilization, low cost and satisfied customers. Sympathetic fellow travelers worldwide



Aviation Industry - Market

Turnover USD \$1.1 Trillion Number Aircrafts 350,000



Global Annual Growth
 GA/ BizAv at **7.6%**
 Airlines at **7.0%**
 Asia 9.7%, Latin America 6.7%, Europe 6.3%, US 5.1%, Middle East 4.7%, Africa 2.7%

Airlines USD \$10+ Billion Overhead caused by \$7 Billion GDS fees \$3 Billion global inducements - 37% average revenue 2009-2017	BizAv Operators USD \$200+ Billion Overhead caused by \$114 Billion by empty legs \$90 Billion by intermediaries 1 Million t CO ₂ by empty legs	Passengers Growing Demand for travel & price transparency no search time, no delay mobile instant & direct booking Tier 3+ pass through, seamless
---	--	--