

A T A N A

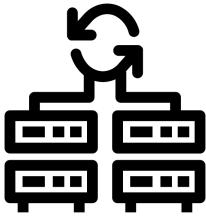
A collaborative launchpad for your scientific endeavors

Problem

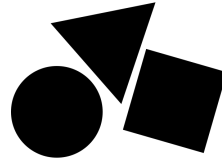
Collaboration expedites biomedical innovation

But resources for scientific collaborators are fragmented

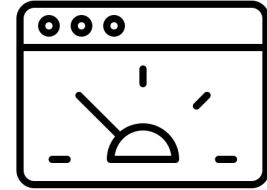
Problem



External data streams
can't securely integrate
into workflows



Inconsistent standards
restrict real-world
implementation



Partnerships are slow
to form due to an
inherent lack of trust

Solution

Rebuilding science to make collaboration work

Integrated

EHRs, apps, wearables

Plug & play custom tools

Cross-platform API

Unified

Continuously updated
repository of standards

Interoperable data
models

Economic incentives for
regulatory adherence

Trusted

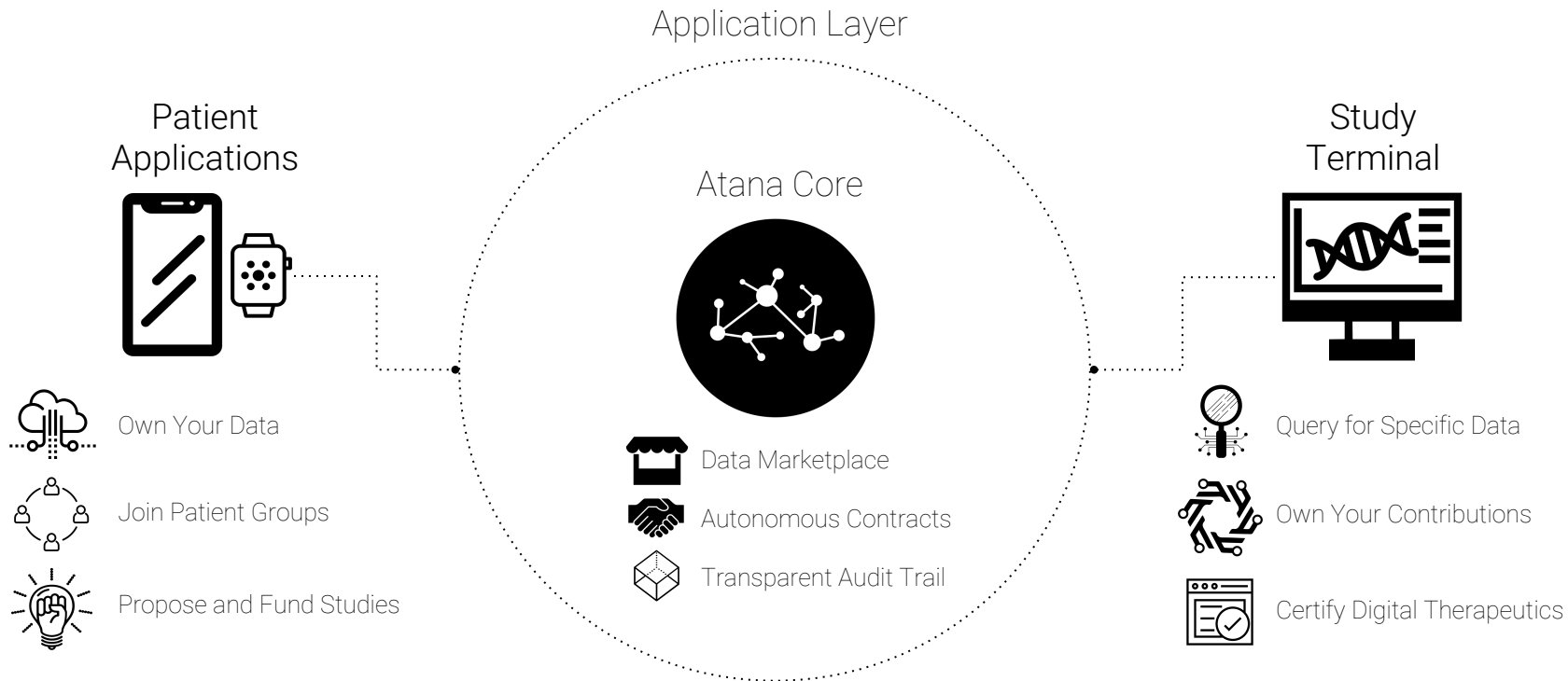
Blockchain-enabled
identity management

Immutable audit trail of
all contributions

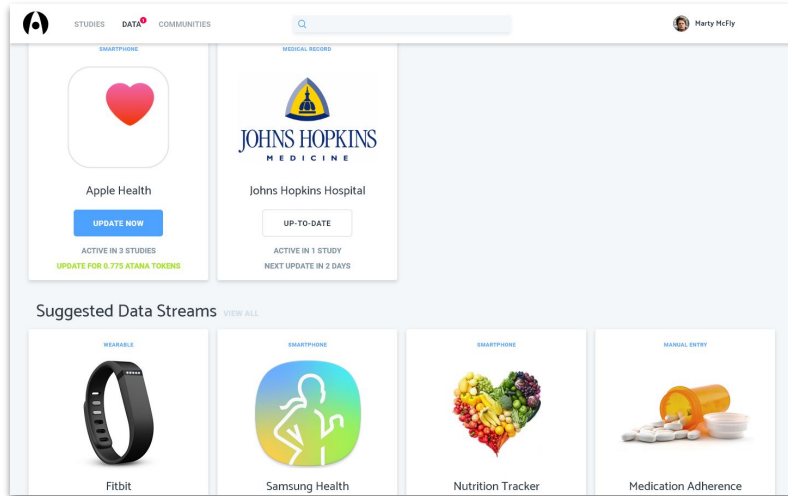
Encrypted and extensible
workspace architecture

A multichannel platform matching innovators with trusted partners, resources,
and standards that fit their needs on a private blockchain network

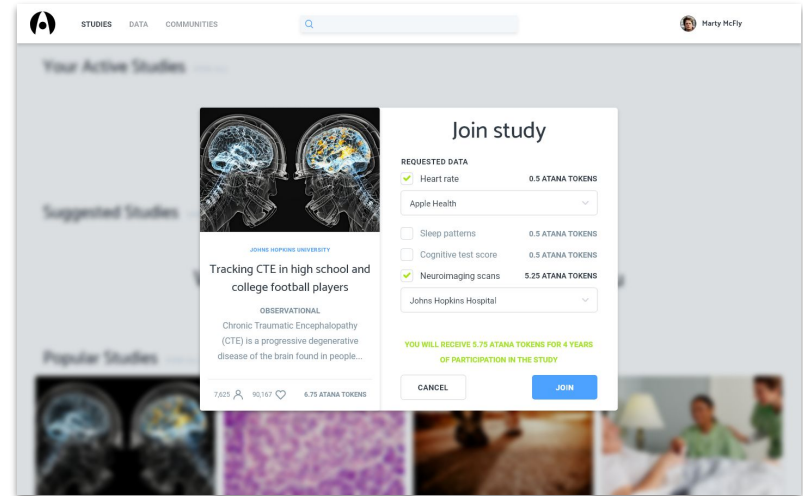
The Atana Platform



Integrate and Share Data

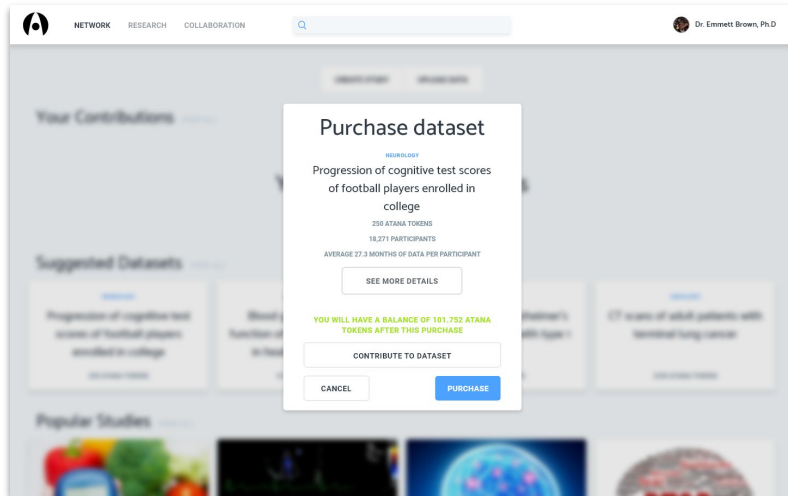


Patients easily integrate and update diverse data streams in their secure profiles

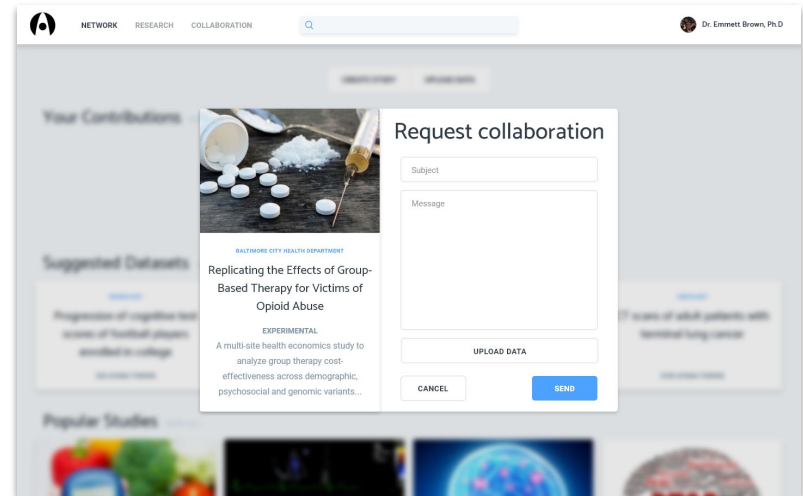


Patients decide what data they want to share and with whom they want to share it with

Access Data and Studies



Researchers and institutions purchase datasets and contribute to existing ones



Scientists join collaborative studies to earn awards and bounties for their work

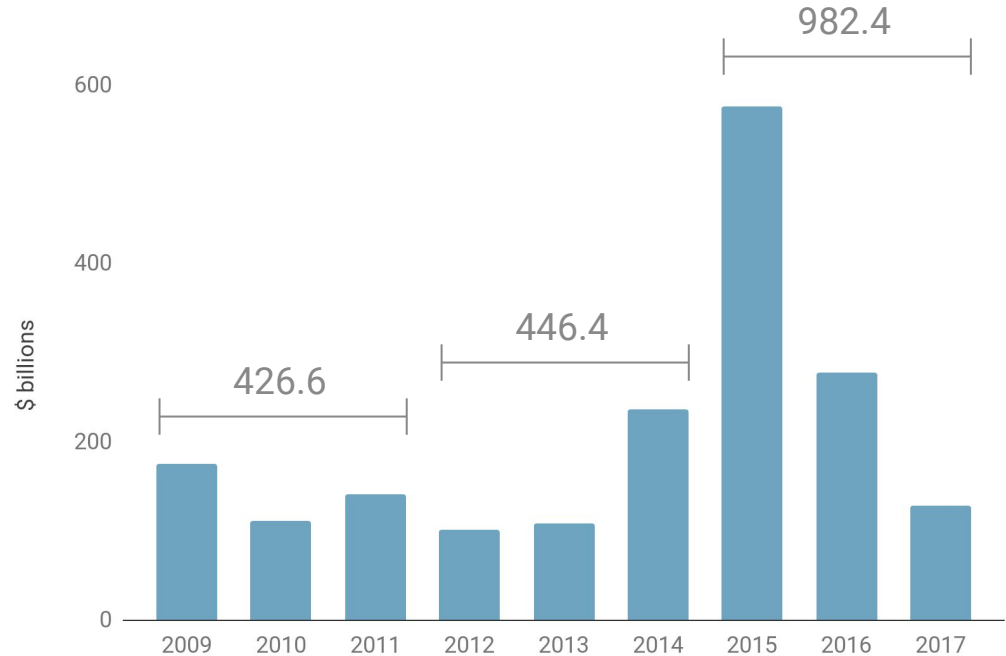
Trust Every Deployment

The screenshot displays the ATANA web application interface. At the top, there is a navigation bar with the ATANA logo, 'NETWORK', 'RESEARCH', and 'COLLABORATION' links, a search bar, and a user profile for 'Dr. Emmett Brown, Ph.D.'. The main content area is titled 'Your Contributions' and features a large plus sign icon. Below this, there are sections for 'Suggested Datasets' and 'Popular Studies'. The central focus is a 'Certify therapeutic' form. This form includes a large plus sign icon, a text input field for 'Name of digital therapeutic', and another for 'Short description of digital therapeutic'. To the right of these fields, there are three validation status indicators: 'CLINICAL ASSOCIATION VERIFIED', 'ANALYTICAL VALIDATION VERIFIED', and 'CLINICAL VALIDATION NOT VERIFIED'. Below these indicators are buttons for 'SUBMIT OUTPUT', 'APPLY FOR REVIEW', and 'START STUDY'. At the bottom of the form are 'UPLOAD SOFTWARE', 'BACK', and 'CERTIFY' buttons.

Digital therapeutics and biomedical companies validate their products for successful real world implementations

Market

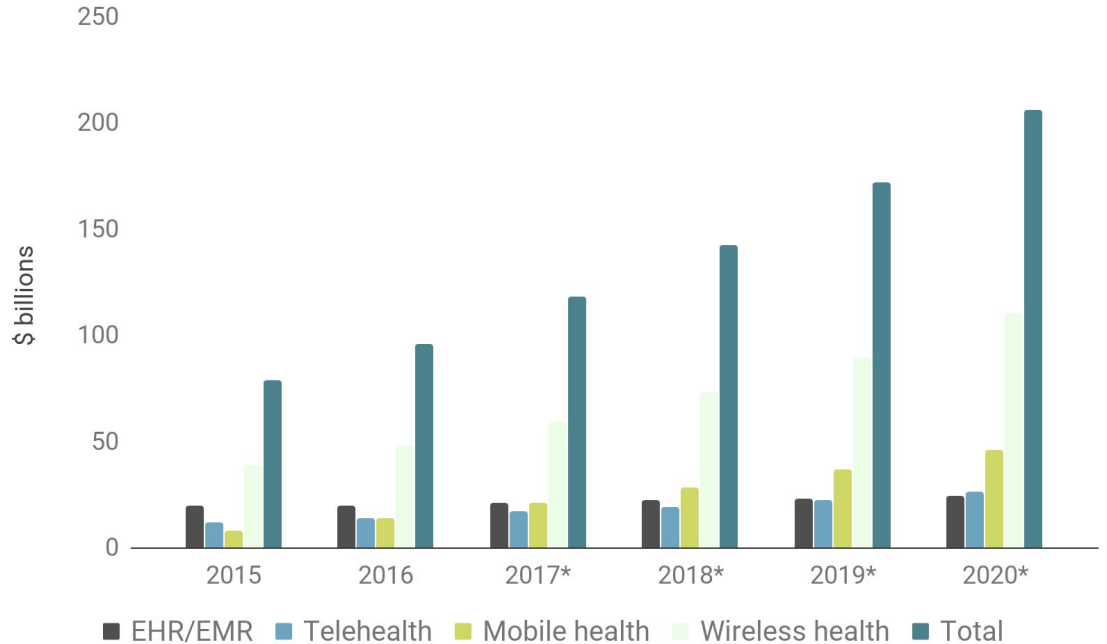
\$1 trillion spent on M&A in the biomedical research industry in the last 3 years (US)



- [1] "U.S. Investments in Medical and Health Research and Development." Research America, 2017, <https://goo.gl/a1YzM7>
- [2] Panel Endorses Funding Increases for NIH Research, Opioid Abuse Fight, Pell Grants. (2017). <https://goo.gl/Z2ewQ6>
- [3] Kermani F. Drug discovery partnerships between UK CROs and the Swiss pharma sector. Pharm Technol Eur. 2014;26:8-11.
- [4] How big is the market for...? (n.d.). <https://goo.gl/hPoaNq>
- [5] Healthcare and Life Sciences Industry Update. (2017). Harris Williams and Co. <https://goo.gl/xfg82B>

Market

Digital health market expected to exceed **\$206 billion** in value by 2020 (Global)

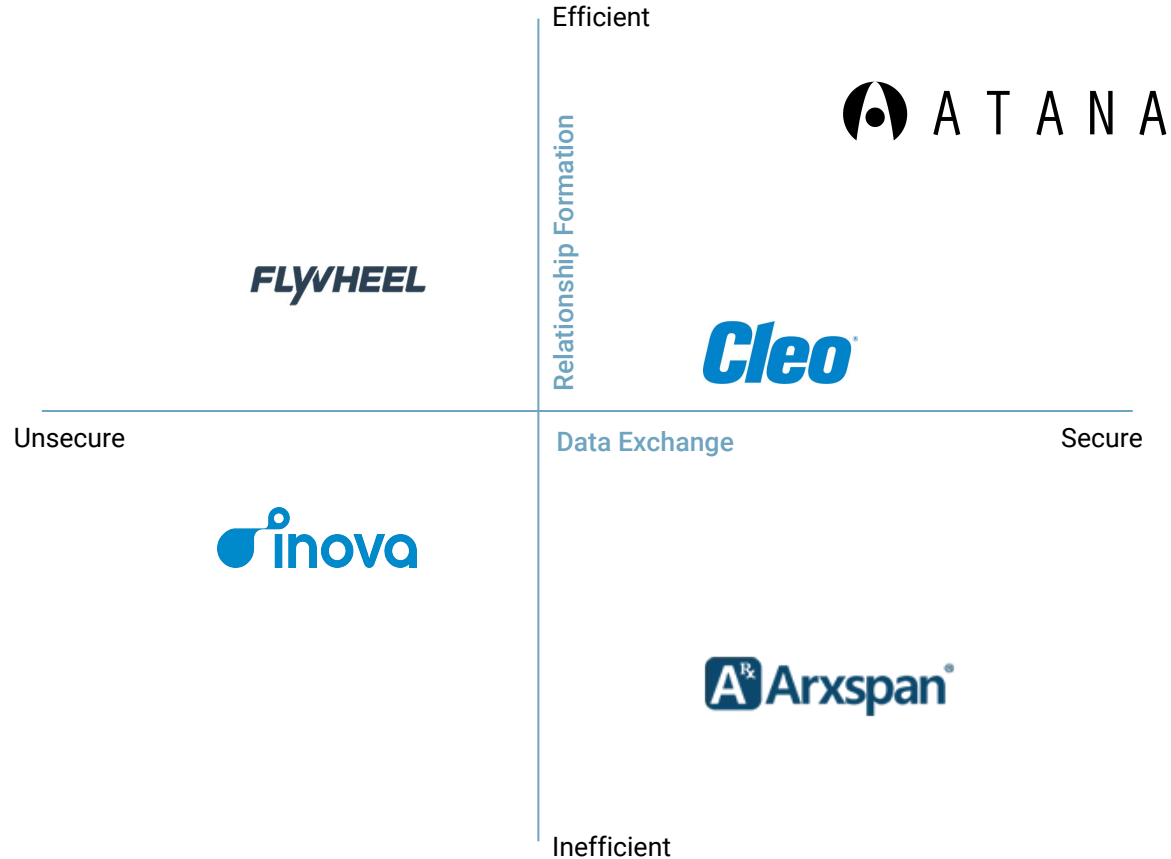


[1] Roland Berger. (n.d.). Global digital health market from 2015 to 2020, by major segment (in billion U.S. dollars).<https://goo.gl/szp5m>

Business Model

	Target Customers	Value Proposition	Revenue Model
Study Terminal	<ul style="list-style-type: none">• Pharmaceutical companies• Research institutions• Biomedical and digital therapeutics startups• Contract research organizations• Hospital systems	<ul style="list-style-type: none">• Access siloed data• Leverage previously unobtainable knowledge• Increase partnership quality and creation	<ul style="list-style-type: none">• SaaS• Standard and premium versions• Royalty from IP licensing
Digital Therapeutic Certification	<ul style="list-style-type: none">• Investors• Biomedical companies• Insurance companies• Employers	<ul style="list-style-type: none">• Improve ROI by funding and implementing validated applications	<ul style="list-style-type: none">• Certification reports• Consulting fees

Competitive Landscape



Competitive Advantages

First to Market

First to market digital therapeutics certification and practical distributed ledger based research platform.

Domain Expertise

50+ years building platforms and statistical tools for analyzing genomic, imaging, clinical, and IoT health data, and commercializing digital health technologies.

Product-Market Fit

Platform accelerates ongoing large-scale efforts to transform the biomedical technology industry, capitalizing on demand for tools that conform to changing R&D strategies.

Proprietary Blockchain

Custom hybrid blockchain leverages the advantages of both private and public blockchain network models.

Backed by Hopkins & Stanford

Deeply embedded in the Johns Hopkins and Stanford health and biomedical research communities. Clinical, marketing and product support from faculty advisors.

Token Generation Event

Non-dilutive capital raise within the next 6 months. Network development and business opportunities bootstrapped by decentralized community of token holders.

Leadership

David Shi, Co-Founder and Chief Executive Officer

Led multiple M&A transactions. Technical consultant for Aeternity Blockchain (\$77m token sale). Awarded by Booz Allen Hamilton and J.P. Morgan for blockchain platform implementations.

Kevin Joo, Co-Founder and Chief Technology Officer

10 years in academic and industry R&D. Created HIPAA-compliant API and data science platform for WellDoc, a FDA-approved health startup.

Nam Nguyen, Chief Operating Officer

Led special operations at PCCI, a precision medicine company. Created growth strategy for enterprise SaaS product leading to 800% sales growth at Pieces Technologies, a clinical A.I. startup.

Ed Li, Vice President of Product

Investment banking analyst at J.P. Morgan. Head researcher at the Johns Hopkins Institute of Applied Economics and Global Health.

Eric Bridgeford, Vice President of Engineering

Created hyper-parallelized cloud framework for reliable DWI and fMRI connectome mega-analysis with NeuroData. Developed software for conducting scalable million-node graph analytics with Gigantum.

Trevor Aron, Lead Blockchain Architect

Co-created Spire, a Byzantine fault tolerant SCADA for smart power grids. Won awards from the Johns Hopkins Department of Computer Science for research in distributed systems and networks.

Richard Chen, Lead Data Scientist

Co-created the Proscia artificial intelligence engine for cancer detection. Years of machine learning experience at Apple Health Special Projects, Johns Hopkins University, Harvard Medical School.

Advisory Board

Ruben Amarasingham, M.D.

Founder and CEO at Pieces Technologies, and inventor of the Pieces™ DS software system. Inaugural Director of the Biomedical Informatics Program for the NIH CTSA at UTSW. Member, HIMSS Board of Directors.

Peter Beilenson, M.D.

CEO and President of the Evergreen Health. Served in Maryland as the Howard County Health Officer from 2007 to 2012 and as Baltimore City Health Commissioner from 1992 to 2005.

Kevin Frick, Ph.D

Vice Dean and Professor at the Johns Hopkins University (JHU) Business School. Created decision-making frameworks for policymakers through health economics and cost-benefit research.

Steven Salzberg, Ph.D

Bloomberg Professor of Biomedical Engineering, Computer Science, and Biostatistics at JHU. Top 1% cited in genomics. Co-author on the Human Genome Project and co-founder of the Influenza Genome Project.

Matthew Green, Ph.D

Assistant Professor at the Johns Hopkins University and award-winning researcher. Created first zk-SNARK implementation in a cryptocurrency. Founding scientist of ZCash (\$1.6B market cap).

Christopher Ensey

Chief Operating Officer at Dunbar and founder of Dunbar's cybersecurity business. Experienced cybersecurity executive and creator of the Cyphon enterprise cybersecurity platform.

Michael Xu

Chief Architect at ConsenSys, leading blockchain software and cryptocurrency development company. Developed clinical and operational analytic tools for IBM Watson Health at Explorys.

Ask

Pre-Seed

December 2017

30K
(non-dilutive)

JHU Business Plan
Competition

AARP Foundation Prize for
Healthcare

O'Connor Fund by JHU Tech
Ventures



Series Seed

Ongoing

100-350K
(convertible note)

Use of funds

Build and implement
enterprise-ready platform

Deploy the software in
conjunction with strategic
partnerships