The Orchestration Governance Model

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Governance of Global Supply Chain Networks
Features of a Well-defined Network Governance Structure

- Identifies and manages relations with government, trade & social groups, labour, resources and B2B and B2C delivery mechanisms
- Builds business models and relationships for growth enhancement
- Builds systems for effective communication, collaboration and coordination among the network partners
- Identifies and categorises risks from various ecosystem sources and puts in place risk mitigation strategies in operational readiness
- For every customer order, selects the partners, allocates the tasks and responsibilities & forms the network
- Ensures that labour laws & environmental standards are followed.
- Manages a control room for monitoring and execution of the planned activities in a timely manner under both normal & severe conditions

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Governance: Partner Selection, Coordination & Control

- The supply chain is an inter-organizational network
- A separate chain is formed for each order
- **Partner selection** based on
  - Structural features (asset specificity, capabilities)
  - Relational ties (govt., social organizations, cluster managements, etc.)
- **Coordination**: Determining who does what and when and communicating to everyone
- **Execution**: Monitor order status so that processes work as per plan & control exceptional events
Governance: Partner selection, Coordination & Execution

Partner Selection

Suppliers → Manufacturers → Distributors → Retailers

Logistics (L)

Execution

Coordination

Other Agencies
Three Types of Network Governance

- The Network Governance model
  - Highly Centralized External Broker (Li & Fung, Olam Intl.)
  - Participant Shared Governance by Elected Board (Healthcare, Dairies, Cooperatives)
  - Participant Shared Governance with a Lead Player
    - Producer-driven (Cisco, Nike)
    - Buyer-driven (Wal-Mart, Carrefour, Levi)

- All three governance forms are in practice & None proved superior.
Ecosystem Aware Global Supply Chain Management

The Orchestration Model

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Leveraged growth: Orchestrate, Do Not Own

- The traditional business growth—organic expansion and acquisition require investment in proprietary assets. To grow organically, you build new assets. To grow through acquisition, you buy them. Either way, you own them.

- But the need to own assets—whether physical ones or intangible ones—is what makes traditional growth model risky. You invest up front & payoff may come later.

- The leveraged growth mobilizes the needed assets existing within other companies to support its own growth initiatives
  - Developers using contractors and marketing
  - Traders using contract manufacturers
  - Control Room in another Country Orchestrating Terrorist attacks in another Country
Orchestration

- Orchestrators are “learning organizations” with privileged relationships; their employees may never touch a product.
- Such organizations mobilize other companies’ assets and capabilities to deliver value to customers.
- Leveraged Growth captures the economic benefits while avoiding the economic burdens of asset ownership.
- Orchestrators must be competent at recruiting the right providers, configuring the right modules, and overseeing the performance of the network.

- **Network architect:** Selects member companies that make up the business network and sets objectives.

- **Network judge:** The orchestrator is the key interface for end customer. To make sure that the network output is the promised one, the orchestrator sets, monitors and adapts performance standards for the member companies of the business network.

- **Network developer:** develops a network’s physical and non-material assets, including knowledge acquisition, knowledge transfer across the member firms and the creation of a strong brand image.

- **Charismatic leader**: should create and manage a rich texture of interactions in the network taking a long-term view on the relationship and expect partner companies to do likewise

**Orchestrator & Partners Succeed or Fail together**
Value of Orchestration Global Supply Chains

- Value in the traditional firms comes from owning assets, specialization, honing skills in specific areas, protecting trade secrets, and keeping out rivals and even partners.

- Value of orchestration in manufacturing or service networks comes from Leadership, Integration, Targeted Performance, Bridging borders and leveraging the company’s connections and knowledge across the network.
Examples of Orchestrators
Orchestrators in Real World

- A contractor of a large commercial building construction project, orchestrates a broad array of highly specialized service providers for construction, electrical wiring and fittings, plumbing, interior decoration, furniture design and security systems.
- The cinema producer orchestrates the complex processes required to make a movie.
- In apparel business, Li & Fung provides a powerful example of a new kind of sophisticated orchestrator coordinating a very broad process network.
Olam International has evolved as a global leader in agricultural commodities with its base in Singapore from a small Nigerian company. Olam does not own farms, but orchestrates a network of many small producers.

Olam International Limited supplies raw and processed agricultural commodities, grown mainly by small and medium-size producers in developing and emerging countries, to regional & international customers.

Olam directly engages in the sourcing, processing, transport, warehousing and distribution of a broad range of commodities, including cocoa, rice, timber, cashew nuts, cotton, coffee, sugar, sesame, sheanuts, and spices.

Olam is a supplier to many of the world’s most prominent brands offering reliability, consistency, trust, traceability, & other value-added services.
Network Orchestration in Airlines

- Major airlines were asset-intensive and own aircrafts, reservation systems, maintenance teams, baggage crews, & catering services.
- Southwest, JetBlue, and RyanAir retained only the core of branding and the concept of the airline and put all other operations out to bid: They leased engines & aircraft, and contracted out baggage handling and maintenance.
- To ensure that planes fly on time and maintain their safety records required orchestration skills particularly when the business processes were not fully owned by the carrier.
- While the success of these carriers is rightfully attributed to their distinctive strategic positioning, this positioning depended upon skills in network orchestration.
Talents needed for orchestrators

- **Deep Domain Knowledge**: Detailed understanding of practices and processes being coordinated including IP issues.
- **Builds capabilities for Management** of Procurement, Acquisition, Partner selection, Monitoring, Supervision and Visibility across the SCN.
- **Relationship Management**: developing and maintaining Trusted relationship with Customers, Suppliers, Service Providers, Government, Employees.
- **Capabilities** to Identify, Continually Redesign and Manage Processes to changing market needs.
- **Recruiting the right Talent & Training**, Mentoring them with the appropriate Performance evaluation tools

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When 10 men attacked the Taj Mahal Palace hotel in Mumbai, in November 2008, they executed one of the best-orchestrated, most technologically advanced terrorist strikes in history.

- Before the assault they had used Google Earth to explore 3-D models of the target and determine optimal entry and exit routes, defensive positions, and security posts.
- During the melee they used Blackberry's, satellite phones, and GSM handsets to coordinate with their command center, which monitored broadcast news and the internet to provide real-time information and tactical direction.
- When a bystander tweeted a photo of commandos rappelling from a helicopter onto the roof of one of the buildings, the center alerted the attackers, who set up a trap in a stairwell.

It took three days for authorities to kill nine of the terrorists and arrest the tenth; which had resulted in 163 deaths and hundreds of injuries.

There were resources that could have addressed the problem, but they weren't in the right place, not under the right authority. Governance is missing from the Indian Side.
Control Room Orchestrating MUMBAI attacks

- Stocked with computers, televisions and voice-over-internet phones from a Foreign company and satellite phones, top commanders of the terrorist organization had set up a control room from where they controlled and directed the 26/11 Mumbai carnage.
- The terrorist organization may have set up a remote command post in a safe house or a hotel in India and make believe that it is in some other country.
- The phone handlers made the attack interactive, relaying reports about television coverage to the gunmen.
Orchestration In Supply Chains
Orchestrator is highly embedded in the supply chain, almost all the actors will interact with it.

The relationship between the focal firm and the Orchestrator represents a strong tie in the sense of providing access to valuable resources that in this case are the benefits arising from Orchestrator know-how and relationships.
Orchestrator Business Model

Planning, Coordination and Overall Responsibility

Orchestrator

Orders
Payment

End Customer

Material Flow

Supplier

3PL

Contract Mfg

3PL

Supplier

3PL

Contract Mfg

3PL

Supplier

3PL

Contract Mfg

3PL

Ecosystem Aware

Global Supply Chain Management

Execution
Orchestration of SMEs
SME Orchestration: Strategic Functions

- Develop, maintain, and continuously upgrade the SME network in response to the market requirements
- Recruit and develop service providers into the SME network
- Identify players in the ecosystem (customers, government, 3pls) and develop strategic relationships
- Cultivate a deep understanding of underlying business processes and practices in the vertical
- Define standards with SMEs for communication, coordination, and execution of constituent services
- Structure tangible and intangible incentives for SME participants
- Develop and manage performance feedback loops to facilitate learning about individual SME performance and risk profile.
Operational roles of an orchestrator

- For a customer demand, unbundle the service and dynamically compose a service chain, involving multiple service providers.
- Identify quality suppliers, help them design and manufacture products meeting stringent delivery requirements despite the poor quality infrastructure.
- Identify check points, targets, deadlines, and interfaces for each of the activities in the service chain and monitor at the higher level, whether these are met.
- Monitor and handle exceptions, so that the final service delivery is not affected.

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Interaction with various participants in the Supply Chain

Client

Design

Material Sourcing

Factories

Quality control

Logistics

Production Process

orchestrator

Ecosystem Aware Global Supply Chain Management

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