Strategic Energy Pilot

Detailed Options Appraisal

YORK & NORTH YORKSHIRE COMBINED AUTHORITY

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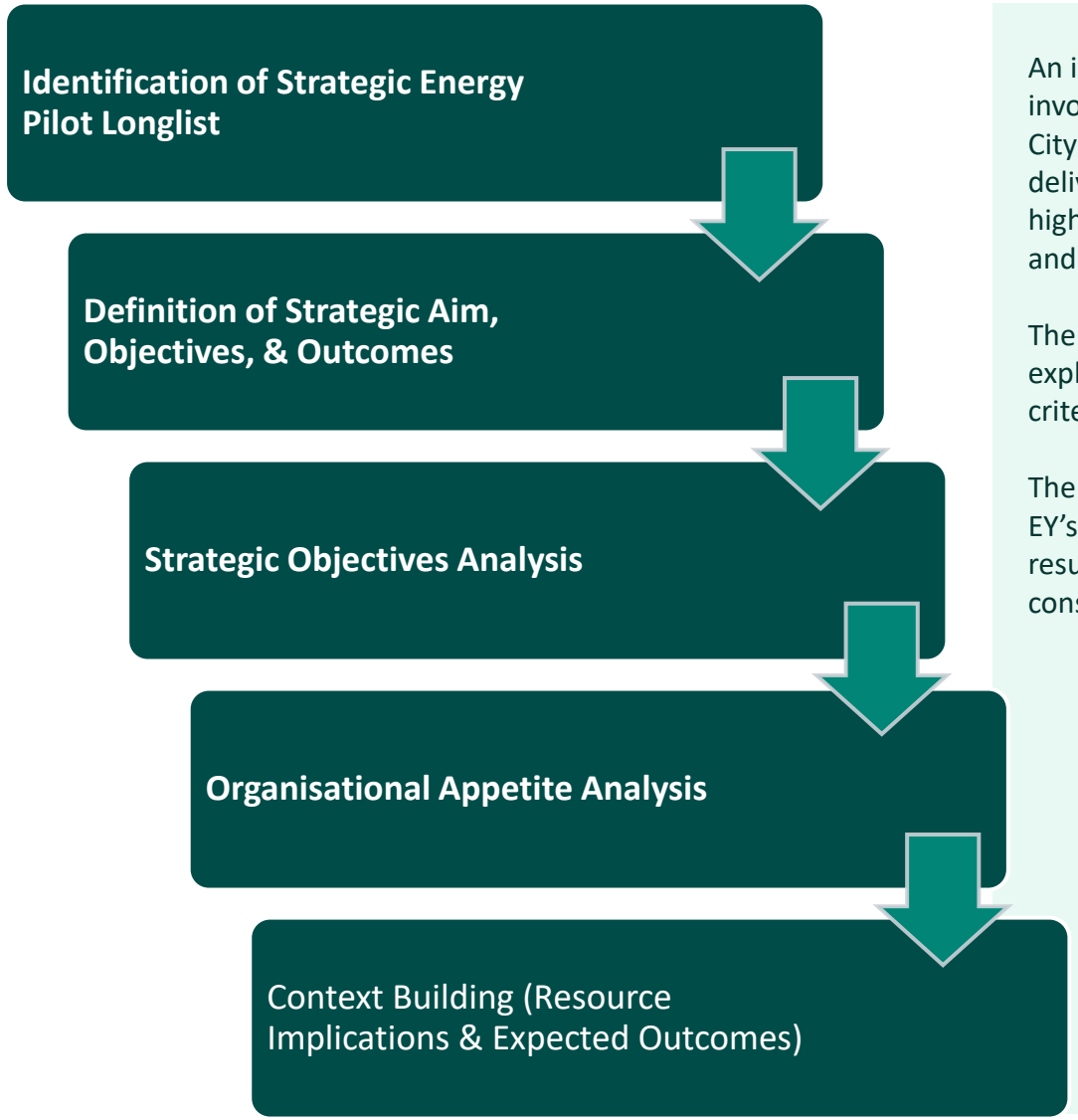


An initial options appraisal report was completed by consultants EY in February 2025. The process involved initial engagement of key stakeholders within the CA, CYC, and NYC and consulting Bristol City Leap to identify lessons learnt and practical insights. The report identified several potential delivery models to accelerate the pace of decarbonisation development and delivery, providing a high-level evaluation of each model. Crucially, the report highlighted a series of key considerations and next steps.

The project team utilised this report to develop this work package forward, undertaking further exploratory research, multiple key stakeholder workshops and further analysis according to defined criteria, aim, objectives and intended outcomes of the programme.

The first outcome of this process identified multiple potential model options in addition to those of EY's initial report to analyse. It was also recognised that the combination or variation within models resulted in the multiplicity of options demonstrated in the following list. (Note: not all were considered in the longlist due to initial filtering of requirements)

- 50/50 Joint Venture
- Strategic Partner-Led Contractual Joint Venture*
- Strategic Partner-Led Corporate Joint Venture*
- Authority-Led Framework Model*
- Investment Readiness Facility*
- Limited Partner Fund*
- Enhanced In-House Delivery Model
  - Individual Authority-Led
  - Centralised Team*
  - Scaled Up APS*
- Combined In-House Model*
- Regional Company*
- ESCO

*included in SEP options appraisal longlist

Strategic Aim, Objectives, & Outcomes

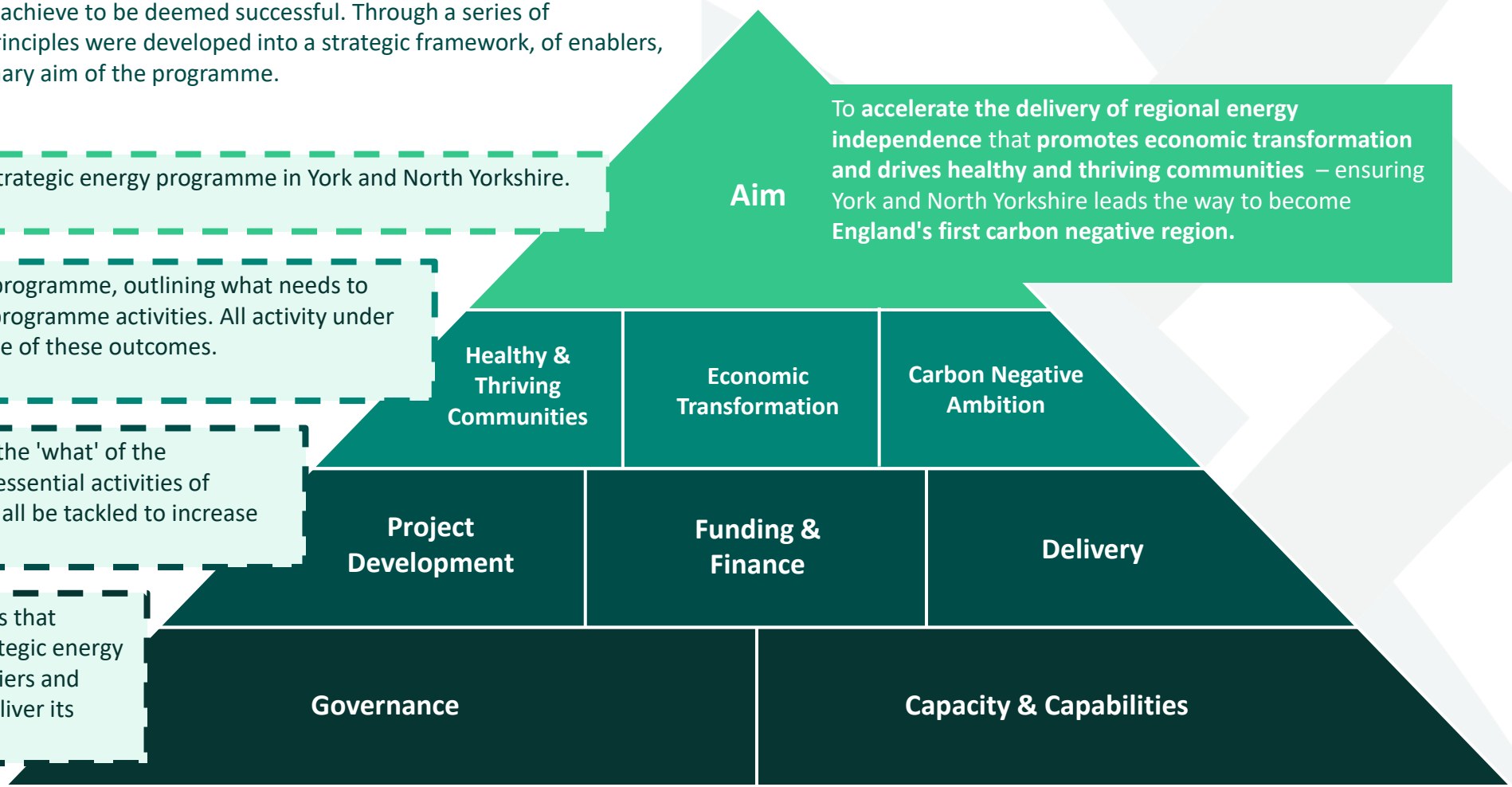
A fundamental aspect of this options appraisal is to develop a common set of requirements, objectives and design principles the model should achieve to be deemed successful. Through a series of workshops, the following criteria and principles were developed into a strategic framework, of enablers, objectives, outcomes, and overall visionary aim of the programme.

Aim: This is the long-term vision for a strategic energy programme in York and North Yorkshire.

Outcomes: These are the 'why' of the programme, outlining what needs to happen as a result of strategic energy programme activities. All activity under this vehicle will aim to meet at least one of these outcomes.

Key Objectives: The key objectives are the 'what' of the programme, these outline the key and essential activities of the strategic energy vehicle. They must all be tackled to increase the pace and scale of decarbonisation.

Enablers: These are the enabling factors that facilitate the desired activity of the strategic energy programme. These factors remove barriers and make it easier for the programme to deliver its objectives.



Strategic Objectives Analysis

The first stage of this options appraisal is to identify the extent to which the proposed model option can fulfil the programmes intended strategic objectives. The following pages (6-9) outline the objective of each pyramid segment in more detail including the requirements of that criteria to be fully realised. Below is the scale in which each model was assessed according to each strategic objective criteria.

Does not meet the objective at all	Meets the objective very poorly; major gaps or misalignment	Meets the objective somewhat, but with significant issues	Adequately meets the objective; some minor issues present	Mostly meets the objective; only minor improvements needed	Fully meets or exceeds the objective; no improvements needed
0	1	2	3	4	5

Aim:

To **accelerate the delivery of regional energy independence** that **promotes economic transformation and drives healthy and thriving communities** – ensuring York and North Yorkshire leads the way to become **England's first carbon negative region.**

Maximising regional benefits through a strategic place-based approach to decarbonisation. Setting clear, coordinated pathways to create healthy and thriving communities: empowering local voices, strengthening local supply chains and reducing energy bills to produce transformative action at pace and scale.

Strategic Objectives Analysis

Enablers:

Governance

To develop a robust governance route that enables strategically-driven programme delivery at pace and scale.

Requires:

- Flexibility to political uncertainty
- Variation dependent on project factors (ownership, profit sharing)
- Considers longevity of activities beyond model/partnership term (e.g. golden share)

Capacity & Capabilities

To develop regional capacity and capabilities at the required quality to support programme delivery at pace and scale.

Requires:

- Sufficient technical expertise to action at the required pace and scale of commitments (operational & regional).
- Considers longevity of capacity and capability beyond model/partnership term (e.g. retained expertise)

Strategic Objectives Analysis

Key Objectives:

Project Development

To develop a strategically-driven pipeline of projects that enables funding & investment.

Requires:

- Ability to raise project development funding (public & private).
- Sufficient technical expertise (feasibility and business case).
- Consideration of social value and community wealth building (co-design principles).

Funding & Finance

To secure and optimise public funding and commercial investment, harnessing innovative approaches to maximise regional outcomes.

Requires:

- Ability to aggregate and bundle projects.
- Access to commercial investment.
- Ability to blend public funding with private finance to maximise opportunities.

Delivery

To enable project delivery at pace and scale, harnessing the use of local supply chains.

Requires:

- Growth in demand of local supply chains.
- High standards / quality of delivery.
- Sufficient maintenance and operational abilities.

Strategic Objectives Analysis

Outcomes:

Healthy & Thriving Communities

To enable wider social benefits to be felt within local communities.

Requires:

- Improve comfort in buildings, creating warmer homes with lower energy bills (tackling fuel poverty)
- Increasing associated health benefits (e.g. warm, comfortable homes, lessened pressure on NHS in climate-relevant issues)
- Increasing ownership of local energy projects

Economic Opportunity

To enable regional economic growth of the green economy to be felt within local businesses and communities.

Requires:

- Increasing quality job creation and development in relevant sectors.
- Stimulate growth in local supply chains and local businesses
- Increase training / education opportunities

Carbon Negative Ambition

To reduce carbon emissions in line with regional strategies and commitments.

Requires:

- Action at the required pace and scale according to commitments (operational & regional)
- Decrease t/CO2 emitted, greenhouse gas emissions.
- Support the health of natural landscapes and climate resilience alongside associated project delivery.

Organisational Appetite Appraisal

The second stage of the options appraisal was to understand the individual authority appetite to undertaking each model option. A series of workshops were undertaken with key stakeholders from City of York Council, North Yorkshire Council and the Office for Police, Fire and Crime to discuss desired roles and understand red lines that would inform this analysis.

The analysis of individual authority appetite to each model scenario was completed according to the criteria outlined on this page (right), with reference to the scoring scale (below).

Score	Description
1	Unacceptable scenario, this is a red line.
2	May face resistance politically or strategically (little acceptability) for this scenario, but not impossible.
3	No preference for this scenario, requires further exploration to make decision.
4	Would accept this scenario but not preferred, would be fully accepted under certain circumstances.
5	Full acceptability for this scenario, this is a preferred way forward.

Theme	Criteria
Strategic Fit	Alignment with the Strategic Energy Partnership **objectives and principles.**
	The ability to align with and consider **existing arrangements, policies, strategies.**
Control	Ability for Authority to exert **strategic control** over the delivery model through defined governance structures.
	Ability for Authority to exert **operational control** over the delivery model through defined governance structures.
Influence	Ability for Authority to have strategic influence to **shape the route to net zero.**
	Ability for Authority to have strategic influence to **drive wider social value and economic benefits.**
Risk	The degree to which the Authority is **exposed to the overarching delivery risk**, which refers to risks associated with the origination, development, financing and successful execution and management of the net zero pipeline.
Reward	Ability to **benefit from the rewards** that arise at a delivery model level (project returns).
Time	Time required to design, develop and **procure/implement the strategic delivery model** (up to contract signing).
	Ability to design, develop, and deliver pipeline at **required pace and scale.**
Resource	**Resource required** from the Authority for the procurement process and the day-to-day running of the delivery model.
	The **degree of asset handover required** by the Authority to the private partner (e.g. ownership, lease model).

Stakeholder Engagement

Initial Stakeholder Workshops

- Assess authority ambition and capacity to undertake its desired role and to understand its red lines

Service Area Engagement

- e.g. EV, Fleet, Housing, Schools and Commercial Assets, provided introduction to understand red lines and opportunities

Scoring assurance

- Authority review of organisational appetite analysis

Project Board Decision Point

- Refined from long-list to initial short-list using authority preferences

Model “deep-dive” sessions

- Insights gained from LAs, FSS, BCL etc. to inform refinement of short-list models.

The diagram (left) demonstrates stakeholder engagement activity to date regarding the options appraisal process. Key areas of this process are detailed below.

1. **Initial Stakeholder Workshops:** Head of Service Area (Climate Change, Sustainability, & Environment) for both NYC and CYC, as well as CYC’s Chief of Strategy were in attendance to assess initial understanding of the acceptability of differing delivery vehicles. The Office for Police, Fire & Crime were similarly engaged in a separate The output of this session allowed the project team to undertake the organisational appetite analysis.
2. **Scoring Assurance:** The organisational appetite analysis undertook an assurance exercise separately between all authorities. The output of this confirmed the scoring of each long-list delivery model and provided a combined and separate list for delivery mode priority.
3. **Long-list to Short-list:** Informed by this assurance activity, a decision to refine the long-list to an initial short-list was approved by the Project Board with recognition that further research could change this list with appropriate justification.
4. **Deep-Dive Sessions:** As part of this further exploration, the model options were explored in greater depth from desk-based research, knowledge sharing and further engagement with the local authorities. In some cases, resulting in adjustments to the short-list.
5. **Senior Stakeholder Engagement:** Thus far, a brief socialisation of the short-listed models has occurred in CYC and the CA. However, a formal senior engagement plan is yet to be undertaken.

Synergies & Shortlist Identification

Synergies

Synergies with other programme work packages provide opportunity to building out the context for each model and the options appraisal process in general. Please see these documents separately for the associated information. These include (but are not limited to):

- Asset Base Review
- Techno-economic Modelling
- Delivery Mode Commercial Assessment Tool (DMCAT) – in progress
- Market Engagement Analysis
- Community Energy Report

Shortlist Identification

From this methodology, the Combined Authority, City of York Council and North Yorkshire Council are interested in collaboratively moving forward and exploring further the following short-list of model options for the regional strategic energy pilot:

- Business As Usual (Do Nothing)
- Combined In-House Model
- Strategic Partner-led Contractual Joint Venture
- Strategic Partner-led Corporate Joint Venture
- Regional Company (Do Maximum)

The following report will provide a detailed analysis of each short-listed model according to the methodology within this section.

How does the information in this document apply to the Outline Business Case?

Strategic Case:
- Stakeholder workshops outlining barriers and challenges that this model option seeks to address
- Strategic framework outlining the proposed objectives and aims this model should fulfil.

Economic Case:
- Overall process of the detailed options appraisal will outline detail of the shortlisted models, their justification for involvement, and the considered, structured to evaluation.

Commercial Case:
- Delivery mechanism details (informs risk and reward profiles and procurement requirements).

Financial Case:
- Estimations of resource implications dependent on each model.

Management Case:
- Model structures and proposed ways of working considerations.

Next Steps

Building on this detailed options appraisal process thus far, it is recognised that the following elements are required to advance the development of each shortlist model. These elements, in some cases model agnostic, will help inform the preferred model decision.

Pipeline Development (Financial & Commercial Considerations)

A definition of the core offering of partners is initially required to understand the core scoping, as well as less advanced projects for further financial modelling. This could be achieved through assessing against the following criteria:

- Project Maturity
- Asset Class
- Location
- Potential delivery mechanism
- Other scoring criteria

An assessment of core prioritised projects as well as a wider pipeline analysis is required to define a balanced portfolio and use to assess current and future bundles of projects. Consideration of the current known project pipeline and ambition to scale through the preferred model will impact model option preference.

- These bundles will be assessed against commercial and social value criteria within a shortlist of delivery model options.
- Agreed projects and bundles will be put through robust financial modelling as required to understand whether they are investor-ready and produce a balanced portfolio.
- The pipeline development framework tool will use these inputs to compare core projects against LAEP and net zero strategic targets and project locations to identify alignment gaps and opportunities in the overall project pipeline. This is to be a regionally agreed governance gateway.

Overall, these considerations will assess the affordability, fundability, and financial returns, apply cost-benefit analysis and sensitivity testing via bespoke modelling to feed into the OBC Financial Case.

Legal/Governance Considerations

- A co-designed governance structure and agreement for joint decision making across YNYCA, CYC and NYC is required to ensure the efficiency of internal processes, ensuring fit with existing processes and stakeholder roles.
- Dependent on the delivery vehicle (e.g. SPV or joint board) a separate governance structure (and corporate/contractual structures) will be required to ensure partnership decision-making is robust and streamlined.
- Within these considerations, the importance of control mechanisms will be considered (model dependent) for the proposed partnership as well as internally between YNY parties.
- These considerations will be integrated into the management case of the OBC and FBC.

Financial Considerations

- Agreement on YNY expectations of each parties financial landscape and front runner projects (core scope) will be required to feed into the OBC and preferred decision.
- Dependent on appetite, shortlisted model, and project, advice on the structuring of risk (and reward) allocation between public and private partners is required to understand the potential maximisation of reward (financial or non-financial).
- A consideration of profit-sharing agreements between YNYCA, CYC and NYC if appropriate is required to understand the separation of reward on a portfolio or project basis.
- Exploration of the feasibility and quantum of available public capital and ranges of blended finance models and routes to market required.

Business As Usual (Do Nothing)

Business As Usual (Do Nothing)

Justification of Inclusion & Drivers/Considerations

According to the HM Treasury Green Book, Business As Usual should be included in the appraisal to provide a benchmark for comparing proposal options for intervention, a baseline for measuring improvement and Value for Money.

YNY has a proven track record of securing public funding for net zero initiatives and possesses a strong strategic understanding of the complexities and diversity of the region and potential energy systems and solutions required to achieve net zero whilst retaining benefits for communities and businesses. Despite this, it is evident that several specific challenges and barriers persist to achieving the regions goals at pace and scale.

	Lack of capacity and capability, particularly in project development	Piecemeal public funding and lack of private investment	Lack of regional governance and delivery routes for net zero
Local Government Considerations	• Local government currently lack the required capacity and expertise to support the development of net zero projects at the pace and scale needed. • This is coupled with the wider issue of lack of green skills within the economy that is holding back the delivery of net zero projects, particularly for housing retrofit programmes.	• Availability and certainty of public funding for net zero projects is typically limited in time and quantum (3-4 years), and can be disconnected across different sectors, which prevents long-term strategic planning for projects • There is currently low levels of private sector investment in net zero. There is a missed opportunity to leverage public and private funding for projects.	• Without a regional governance structure to prioritise net zero projects and have oversight of the LAEP delivery, project development is ad-hoc and uncoordinated, which is likely to create inefficiencies in the system and lead to higher costs for delivering net zero in the long-term.
YNY considerations	• The CA, CYC and NYC recognise that there are constraints on resources (both finance and depth of internal capability) to deliver net zero projects at the pace and scale required to reach their targets and ambitions	• Relying solely on current and future grant funding will not be enough to achieve organisational and regional net zero targets. • There is a need for the CA, CYC and NYC to not only secure future government grant funding, but to go further and seek alternative green finance to ensure delivery of net zero at the lowest cost.	• The CA is a new Combined Authority, and this presents a unique opportunity to deliver a coordinated, strategic approach to delivering net zero across the region and bringing together CYC and NYC with a strong focus on regional decarbonisation.

Business As Usual (Do Nothing)

Strategic Objectives Analysis

Total (out of 35)	7

Theme	Summary		BAU	Score
Governance	Current governance routes are slow, are project-by-project and have no strategic capability. No governance approach currently set up across 3 authorities to decarbonise and deliver LAEPs.		n/a	1
Capacity & Capabilities (Short & Long Term)	Capacity and capabilities are insufficient across project development, delivery, and community engagement and integration to meet demand of pace and scale of commitments.	Capacity likely from piecemeal public funding, no secure longevity of retaining expertise. As demand increases, potential for capacity to struggle.	n/a	1
Project Development	CA (1 FTE embedded from Net Zero Hub to support project development). CYC, NYC (little FTE dedication to project development). Low capacity across 3 authorities, with no easy to access funding apart from ad-hoc national funding and mayoral investment (CNCF, NZF). Expertise is high but doesn't have required technical expertise required for full feasibility.		n/a	1
Funding & Finance	Business cases made internally for funding with no expertise to understand how to get commercial investment. Good track record and ability to access and secure grant funding but struggle to blend with commercial investment.		n/a	1
Delivery	Procurement lengthy process, typically done on project-by-project basis, leading to slow pace of delivery. NYC (Teckal strength to deliver but not across wider net zero portfolio).		n/a	1
Community Benefit	Difficult to engage and benefit local communities because of ad-hoc projects. Capabilities and capacity is not sufficient to engage with communities widely, progress is slow.		n/a	1
Economic Opportunity	Similar to Community Benefit. Ability for positive result but is currently very slow because of pace of project development and delivery.		n/a	1
Carbon Reduction	Current pace of action will not meet decarbonisation targets.		n/a	1

Combined In-House Model

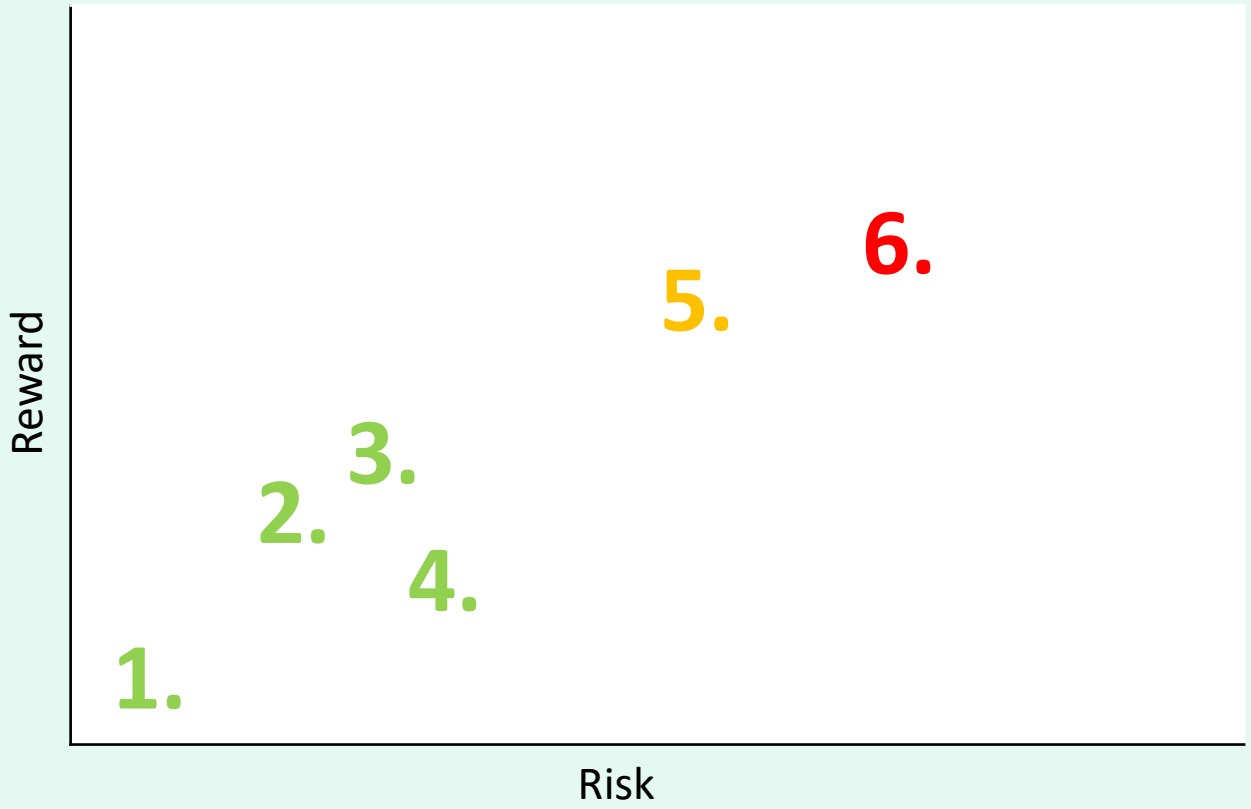
Justification of Inclusion

The preferred mix of in-house vs private sector capacity and capability varies among NYC, CYC and the CA. This option recognises the regions desire and pride in its self-delivery whilst allowing the authorities to tap into private sector expertise on an 'as needs' basis and may facilitate the adoption of innovative solutions and best practises from various private sector partners and financial vehicles. The model can be scaled to accommodate a wide range of projects, from small initiatives to large-scale developments, which is key given the diverse asset base.

Throughout the process, the project team have considered multiple in-house models as well as elements of delivery and/or financial models. As seen below, when assessed individually against the projects major market failures and objectives, the elements/model typically do not score well individually. Therefore, **the shortlisted model proposed in this section is a combination of all the below elements to test an "ideal" in-house option.** (The strategic objective analysis for the below models can be found in the appendix, with brief descriptions and typical project routes).

Barriers/ Market Failures Seeking to Address:	Pipeline Development	Funding & Finance	Delivery	Notes / Justification
Option 2. Authority-Led Framework				BAU project development functionality, BAU funding access as function of framework is delivery.
Option 3. Centralised				Joint capacity rationalisation and efficiency savings but capacity is BAU, no increase pace and scale of delivery and finance.
Option 4. Scaled-up APS				APS have no desire to originate but access to feasibility capacity, reduced scope of APS, BAU ability to raise private investment.
Option 5. Investment Readin Facility				Dedicated regional development fund, project readiness established but no route to market, BAU delivery function.
Option 6. LP Fund				Fund would not provide project development funding, would provide blended public / private capital, includes PM costs but BAU delivery.

Justification of Inclusion



BAU	**1.**	Scaled-up APS	**4.**
Authority-Led Framework	**2.**	Investment Readiness Facility	**5.**
Centralised	**3.**	LP Fund	**6.**

This page demonstrates how each individual in-house model elements varies according to its risk and reward values with justification.

Most in-house models do not combat the need to decarbonise at pace and scale, thereby resulting in less reward. Therefore, a justification to combine these elements was decided to improve these aspects of the shortlisted in-house model.

	Notes / Justification
2.	Low complexity & risk to set up due to familiarity of this function, would provide more streamlined routes to delivery. To consider capacity to maintain framework and project-by-project functionality.
3.	Medium complexity to set up and risk associated is dependent on individual authority appetite. Rationalisation of staff resulting in efficiency savings. Benefit of regional approach and joined-up activities.
4.	Low/medium complexity to set up, risk associated with potential pressure on existing functionality. Aggregation of assets lead to effective delivery but reduced scope questions whether formally scaling-up APS is necessary.
5.	Committed, innovative approach to retain project development funding and integrate social value but little consideration of securing commercial investment and aggregation. BAU delivery function.
6.	Higher complexity to set up, likely requiring significant cornerstone investment from the Authority(s) (buy-in and risk associated). Does not provide project development funding but can aggregate opportunities.

Model Summary

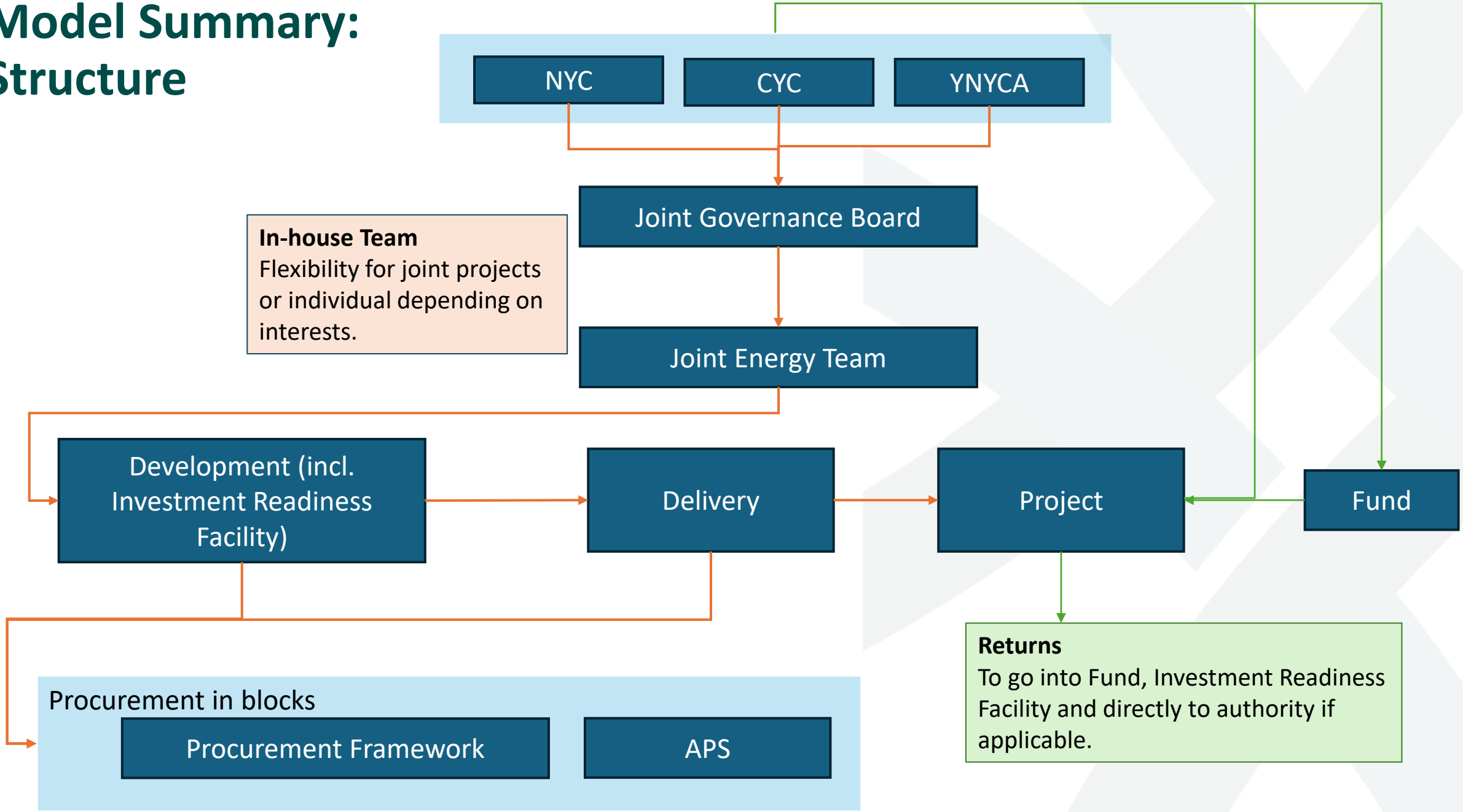
A joint governance board acts as a unified body to set strategic direction, and oversee a centralised, co-located team. Resources are pooled and allocated by the board based on regional priorities. The model would utilise scaling-up existing energy programmes and existing climate change teams to create an internal team. This team responsibilities would range from managing an investment readiness facility and project development, to contract managing delivery with APS and private expertise provided by a separate procurement framework. The private sector is engaged on a project-by-project basis for specialised services that require expertise and resource, this resource would potentially be procured in blocks to ensure effective management of funding. Finance will be addressed through the creation of a limited partner fund with cornerstone investment from YNY to attract private investment and fund commercially investable projects within the YNY region that the internal team will develop through procured private support.

The centralised structure and governance will provide an opportunity to upskill and capacity on in-house teams and deliver at increased pace and scale regionally. The model also facilitates the scaling up of APS, offering another effective delivery route as demand increases.

Structure	Resource
Premise to combine the following in-house elements: • Enhanced In-House Centralised • Authority-Led Framework • Investment Readiness Facility • Scaled-up APS (informally) • LP Fund (or alternative financial mechanism) Resulting in… **Joint Governance Board:** Equal representation from YNYCA, CYC, NYC **Joint Energy Team:** Pooled resources into one operational team (Development, Finance, Delivery) **Fund:** Limited Partner Fund, criteria set by YNY, but funds managed by dedicated fund manager	**Joint Energy Team:** • Built from existing individual budgets. • Variation considered in page 23 • FTE Resource will likely require increase to meet pace of action and demand, **Fund:** Requires significant Cornerstone Investment and employed fund manager **Investment Readiness Facility:** Will require investment from Authority(s) to kick-start. **Procurement Framework:** Will require investment and high procurement capacity to set-up. **Align Property Services:** Will only require resource when/if demand on services increases, do not pre-emptively create third-arm?

Combined In-House Model

Model Summary: Structure

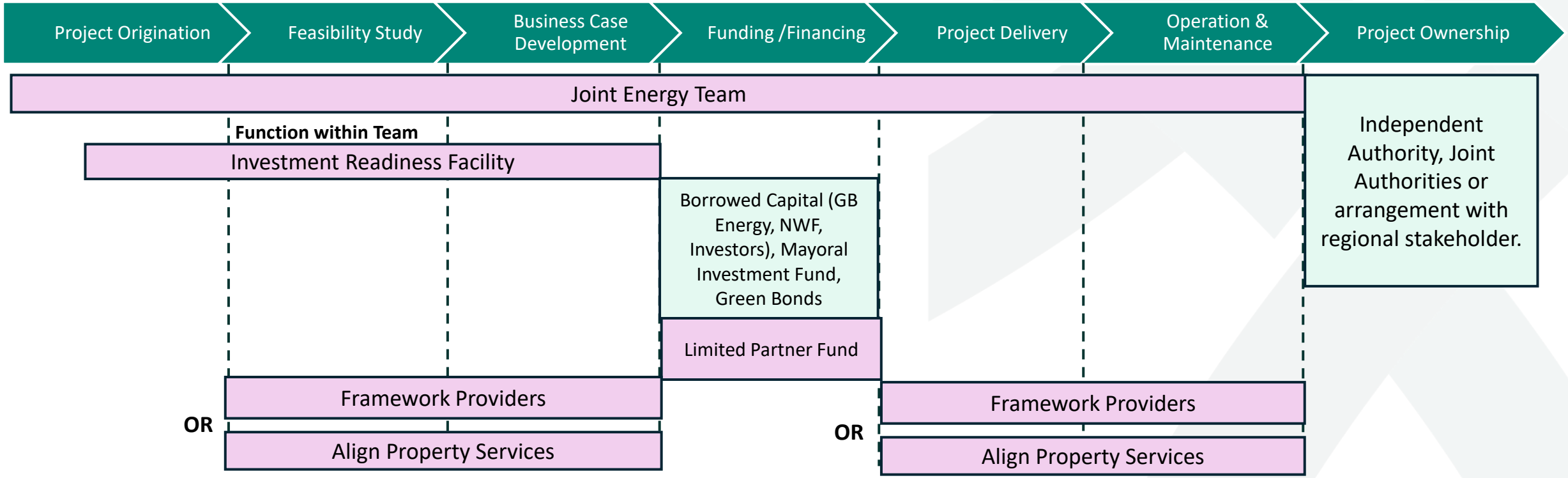


Typical Project Route

Key	
	BAU
	Model Specific
	Other

Project Route

1. Project originated: individual authority, joint team, or wider regional stakeholder.
2. Advise on project development route: Investment Readiness Facility and LP Fund criteria in mind.
3. External expertise procured in blocks where necessary (project development: APS, framework).
4. Project taken to business case and subsequent governance routes.
5. Assessment through fund to allocate finance.
6. Once funding received, external expertise/delivery procured in blocks where appropriate (framework, APS).
7. Returns to LP Fund, IRF and independent investment as appropriate.



Other Notable Considerations

Resource Considerations cont.

How will the Joint Energy Team be set up?

1. Liken to LINC and City Leap structure, (Collaborative Project, joint budget) communication and operational routes are defined.
2. TUPE'd staff into CA to create larger dedicated team. Team vision, culture and aim created by all 3 authorities and lead by steer from Governance Board.
3. Legally distinct team, to allow for combination of budgets and FTE.
4. Other?

Potential Phased Approach

1a. Scaling EGAP Team

- Scaling FTE
- Team set-up
- CYC/NYC dedicated initial FTE for collaborative commitment

1b. Joint Governance Board

- Utilise City Leap Board
- Extend if necessary
- Explore service agreement with APS

1c. Scaling WP1 & WP4

- Build on existing:
- WP1 Energy Landscape: Project Origination
- WP4: Project Development: Feasibility Studies & Business Case

1d. Scaling WP2 Communities

- Build on WP2:
- Community engagement
- Community group call-for-projects
- Developing model for delivery.

2a. Addressing Finance

- Dedicated resource:
- Socialising and setting-up fund
- Alternative financial mechanism: Bonds, Loans etc.

2b. Framework

- Creation of procurement framework.
- Address consortium, engaging with local businesses

2c. Investment Readiness Facility

- Creation of procurement framework.
- Demonstrator Projects through 1c & 1d.

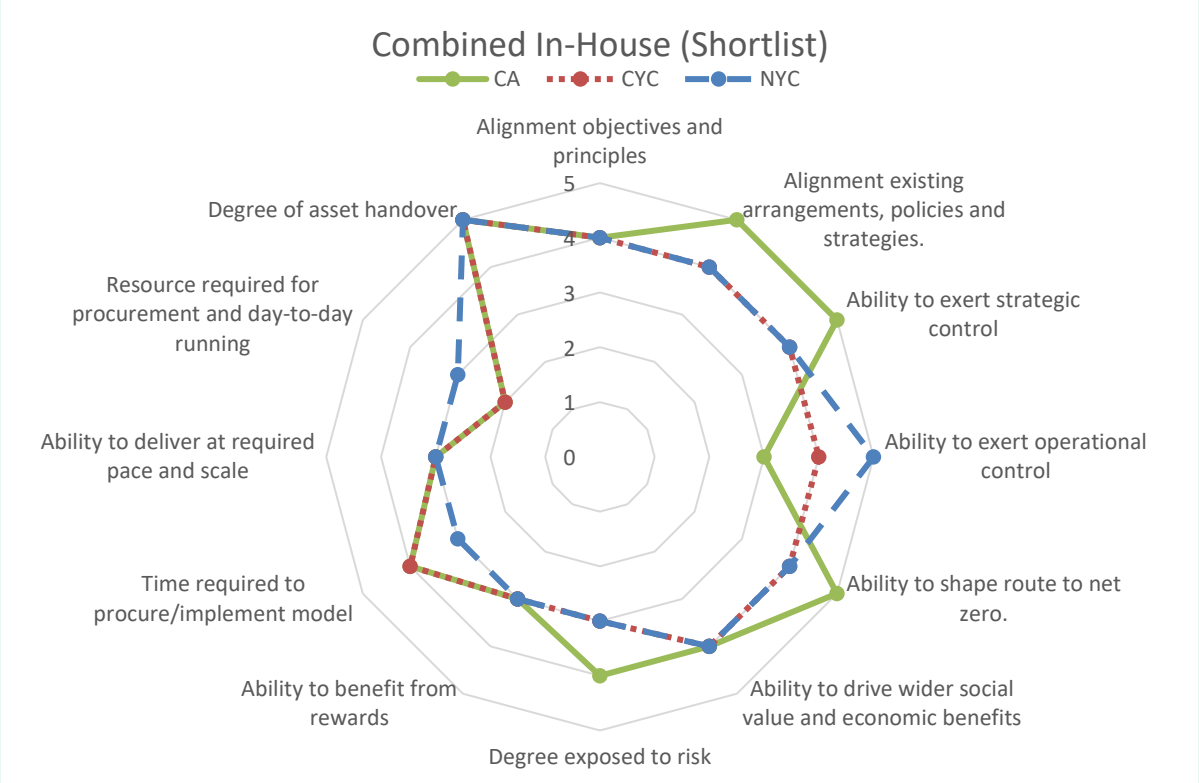
Combined In-House Model

Strategic Objectives Analysis

Total (out of 40)	26

Theme	Summary	BAU	Score
Governance	Route for projects is clear from development to delivery with strategic criteria set within and crucial decision making at stages of financial importance. Joint facilitation of this process for individual authorities likely still leads to project-by-project movement through governance.	1	3
Capacity & Capabilities (Short & Long Term)	Initial scaling of EGAP would respond to key areas of development, delivery and communities. But would be operating like BAU on project-by-project basis. Framework, Fund and IRF would increase pace of delivery and finance, but procurement would still stagger in blocks. Expertise retention would increase due to learning of IRF and Fund.	1	3
Project Development	Revolving investment facility results in longevity of funding. Likely development responsibilities will lie with individual project owner if included in IRF, development team to provide funding and advice. Procured technical expertise in blocks using framework and APS. Setting gateway criteria at development allows consideration of social value throughout, process controlled by YNY entirely.	1	3
Funding & Finance	Optimising funding through revolving fund. Capacity and capability of fund manager to blend public and private (private expertise). IRF and LP Fund bridging gap of commercial investment. Portfolio bundling of projects likely but dependent on investor-type and requirement for commercial return.	1	4
Delivery	Procurement process would likely be shorter than BAU due to SLAs and Framework, procured in blocks ideal but likely some will be on project-by-project basis. Encouragement of consortium approaches with local supply chain possible. Quality of delivery controlled through framework checks.	1	3
Community Benefit	Scaling EGAP WP2 would provide capacity to integrate community engagement, call-for-projects and dedicated model for delivery to be integrated. Gateway criteria at development, funding and delivery stages allow consistent social value benefits to be integrated. IRF to provide possible opportunity to accelerate CE.	1	4
Economic Opportunity	Procurement framework with requirement for consortium/dedication to local supply chain would benefit local businesses and increase demand. Build on Align training opportunities. But limited capacity to support these businesses could result in slow engagement and delivery.	1	3
Carbon Reduction	Not reliant on piecemeal public funding, carbon reduction as KPI in gateway checks. In-house capacity and possible project-by-project decision making will dictate pace.	1	3

Organisational Appetite Analysis



Order	Model	CA	CYC	NYC	Total
1	SP-Led Contractual	54	50	44	148
2	Combined In-House	47	44	46	137
3	Regional Company	48	39	44	132
4	SP-Led Corporate	47	44	35	126

Notes / Justification

CA

Pros: Utilises existing programmes like EGAP and provides a centralised structure to produce regional change at required scale for YNY.
Cons: Lack of utilising private sector for finance and delivery at economies of scale.

CYC

Pros: Provides more control strategically and operationally for the council, with ability to potentially retain reward for core services.
Cons: Would prefer model that increases pace of delivery in short term, more open to private sector involvement.

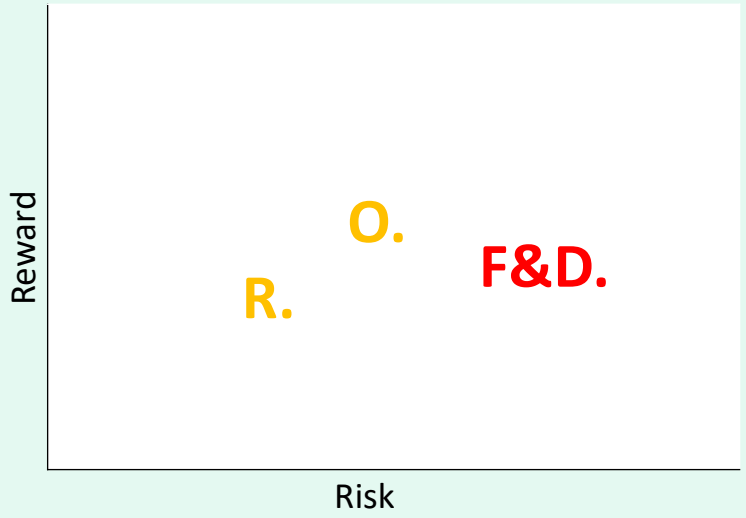
NYC

Pros: Level of control closely aligns with NYC preferences and expectations and use of align and private sector on expertise basis.
Cons: Could face political and officer tension regarding initial requirements, NYC structured very differently and recent organisational changes.

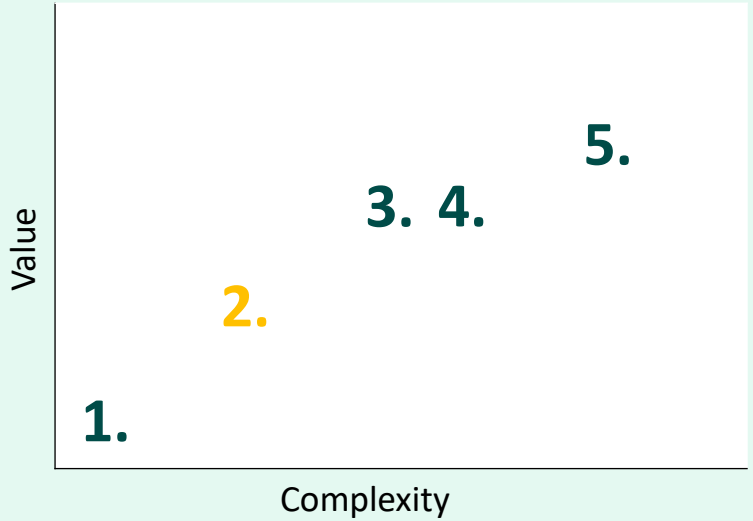
FOR ALL: Note the scores could be adjusted based on commercial and technical context provided to the model, especially regarding resource uncertainties associated with the Limited Partner Fund and whether this is the right fit financial vehicle for this model.

Combined In-House Model

Risk / Reward Analysis



F	Financial
R	Reputational
D	Service Delivery
O	Operational



1	BAU (Do Nothing)
2	Combined In-house
3	Contractual JV Partnership
4	Corporate JV Partnership
5	Energy Company (Max)

Theme	Detail	Risk	Reward
Financial	A fund provides less financial risk on a project basis as funds are diversified and responsibility is given to an external manager. However, the fund and IRF require cornerstone investment from YNY with associated risk. It is likely that YNY would be last receive profit from the fund, but the IRF could be revolving.	High	Moderate
Reputational	Reputational risk lies with YNY.		Moderate
Service Delivery	YNY is fully exposed to delivery risk, on a project level some delivery risk may be passed to the private sector, but contract management will remain in-house.	High	Moderate
Operational	Keeping operations in-house would expose the model to a risk of derailment if three authorities disagree or could be highly influenced by politics.		High

Complexity vs. Value	Mitigation & Dependencies
• Structure could vary but commitment of funding to team set-up and process set up would be significant. • Fund and Framework would be long term complex mechanisms.	• A robust governance route and/or restructuring of this dedicated team would be required to ensure committed, clear, aligned vision and purpose.

Qualitative SWOT Analysis

Strengths

- **High level of Control:** The authorities retain full control and influence over project origination, delivery, and advancement towards net zero.
- **Flexibility:** The model is highly compatible with utilising different origination, funding, delivery and ownership mechanisms. Adapting to different project requirements.
- **Regional Approach:** Facilitates a region-wide approach whilst supporting existing arrangements, ability to scale up existing programmes is a great advantage at upskilling and resource efficiency.

Weaknesses

- **Pace and Scale:** Maximising economies of scale is less likely to achieved due to project-by-project approach, and pace at which delivery occurs is dependent on how much resource YNY can input into the model.
- **Risk:** Authorities bear the full risk of project delivery, which could impact their ability to achieve net zero goals.
- **Lack of market interest:** Some key strengths and opportunities associated with this model may be compromised if there is insufficient market interest or appetite.

Opportunities

- **Scaling APS:** This model could facilitate the scaling up of APS, offering an effective delivery route whilst using the procurement framework for external private expertise.
- **Financial Opportunity:** The Investment Readiness Facility if successful could provide a revolving mechanism that could support the longevity of the model.
- **Government Support:** Current initiatives from GBE, DESNZ and NWF show an increased appetite to fund and support sustainable energy projects, potential opportunity to access easily using this model as evidence of delivery.

Threats

- **Resource Intensive:** Concerns about YNY ability to allocate the necessary resources to manage and execute projects effectively especially to the required pace and scale required to reach net zero.
- **Potential for inconsistency:** Procurement framework approach would need monitoring on a project-by-project basis to ensure quality of delivery is consistent,

Strategic Partner-Led Contractual Joint Venture

Strategic Partner-Led Contractual JV

Justification of Inclusion & Model Summary

A contractual joint venture is a collaborative arrangement where partners agree on terms of their cooperation through a contract, without creating a separate entity. The partnership is a more flexible, collaborative process in which responsibilities across the project pipeline could vary on a project-by-project basis. However, it is expected that to attract this strategic partner, some anchor (or STAR) projects are expected to be handed over from local authority control (e.g. heat network). The authorities are expected to contribute (financially or non-financially) but not necessarily in the same proportion as the Strategic Partner.

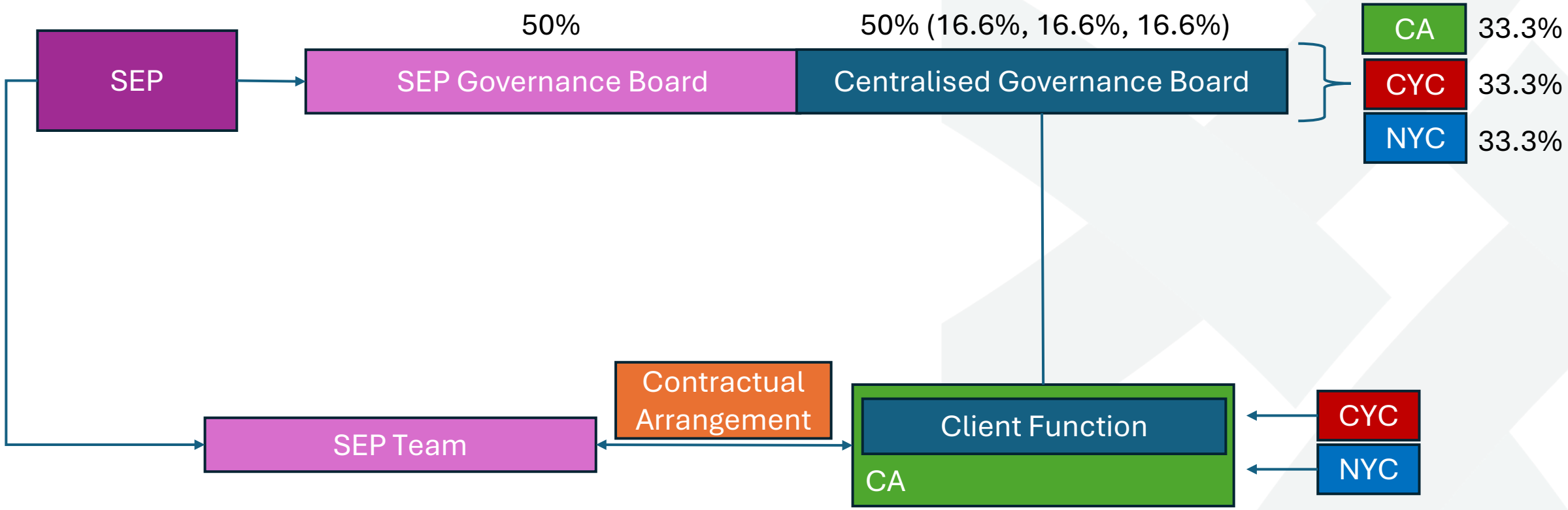
An operational team is exclusively made up of resource from the Strategic Partner, supported by a YNY Client Function that will ensure activities are occurring within the premise of the contract agreement. This team will also develop and follow a set Gateway Process and Project Acceptance Criteria that the strategic partner can submit projects to.

This model was included in the options appraisal through identifying the significant difference between a contractual joint venture model and corporate joint venture model, included due to the projects focus on Bristol City Leap. The differences felt significantly different to justify making this a separate option, also supported by FSS's development of the dual track contractual model.

Structure	Resource
A Partnership Board would be created between YNY and the Strategic Partner to become the decision-making body, responsible for approvals of: - Business Plans - Final Investment Decisions - Project Proposals related to YNY assets The Governance route taken will differ depending on project life (e.g. grant funded, commercial opportunity, community) The Client Function team would be based within the CA with supporting officers from NYC and CYC.	**Client Function Team** Using the example of Coventry (Contractual JV between EoN and Coventry City Council), an in-house delivery team was constructed to assist the strategic partner, initially CCC committed 2.5 FTEs with EoN providing 8 FTEs. FTE will need to scale up according to scale of region. **Align Property Services** Market engagement analysis suggests most strategic partners are open to working with APS but require - Clarity over scope - Aligning governance and approvals - Assurance on APS capabilities and resource - Recognise legal challenges

Strategic Partner-Led Contractual JV

Model Summary: Structure



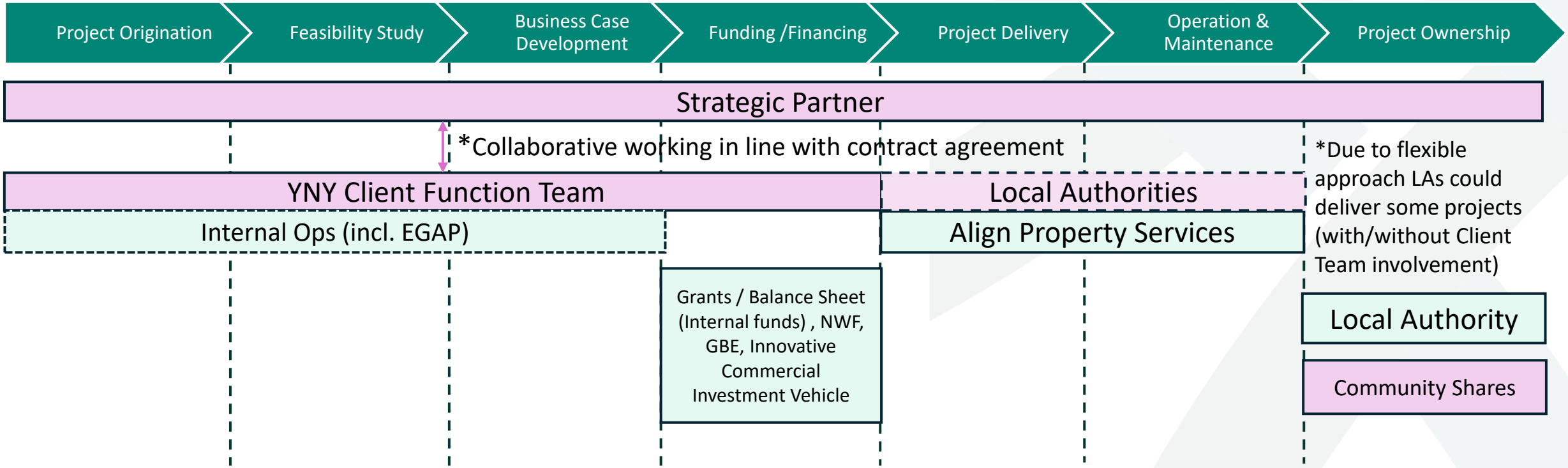
Strategic Partner-Led Contractual JV

Typical Project Route

Key	
	BAU
	Model Specific
	Other

Project Route

1. Strategic Partner and/or individual authority originate a project (in collaboration potentially)
2. Client Function Team assess whether the project fits the contract and gateway criteria.
3. Strategic Partner develops the project to business case level.
4. Project is taken to Joint Governance Board for approval
5. Align Property Services or Strategic Partner delivery according to agreement/appropriateness (if approved)
6. Client Function contract manage to ensure KPIs are being achieved.

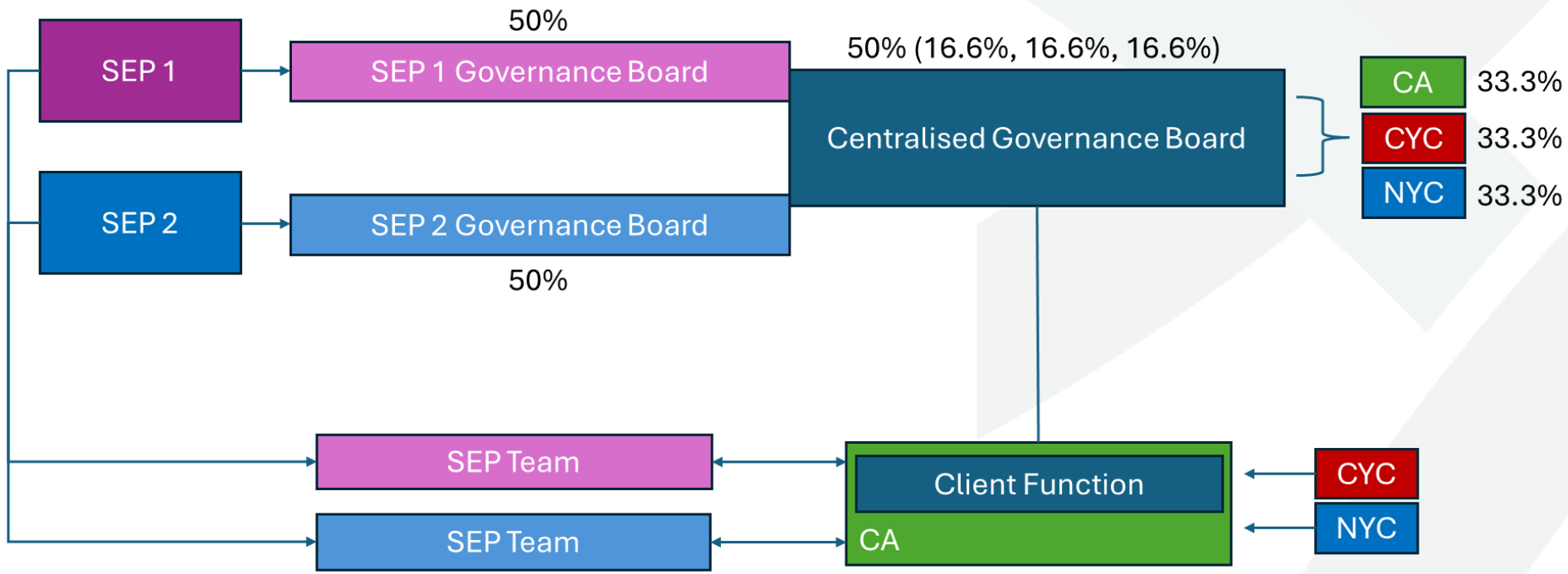


Strategic Partner-Led Contractual JV

Other Notable Considerations

Strategic Partner-led Contractual Joint Venture Model should be considered as an umbrella term for the consideration of procuring two or more strategic partners through contractual unincorporated joint venture. Therefore, this consideration page will outline the Dual Track Coventry model to demonstrate the structure for procuring multiple partners and the opportunity this could pose for YNY. It is important to note the strategic objective analysis and organisational appetite analysis, scores similarly and slightly higher, respectively.

Model Summary: YNY establishes two Strategic Energy Partnerships (Contractual) with joint governance structures, both serving separate needs whether that be urban/rural or technology based.



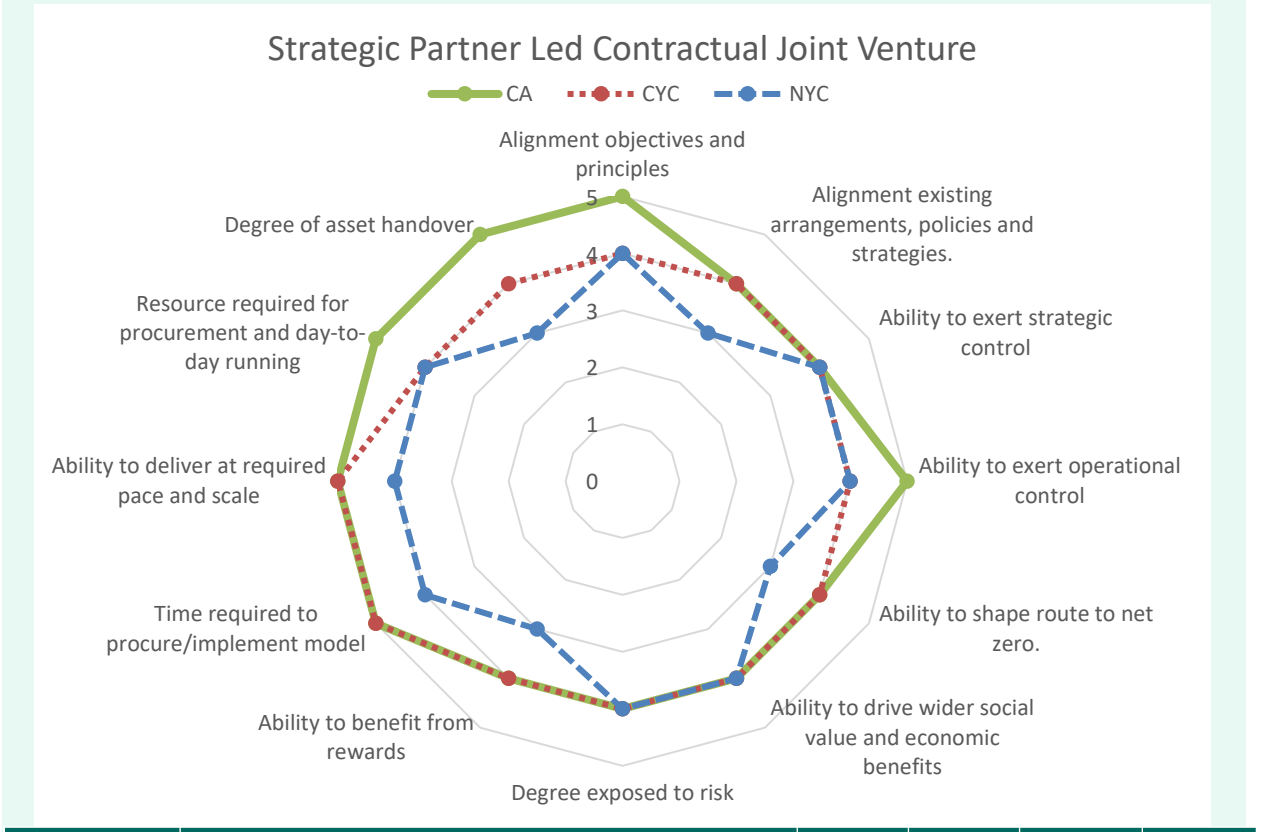
Strategic Partner-Led Contractual JV

Strategic Objectives Analysis

Total (out of 35)	27

Theme	Summary		BAU	Score
Governance	Joint Strategic Board established between YNY and SP (strategic), but decisions come down to contractual arrangement guidelines (robust?). Different governance routes possible. Longevity not considered. Would certain projects still need to go through the extent of individual authority governance? Pace?		1	3
Capacity & Capabilities (Short & Long Term)	Initial influx of private expertise to bolster internal capacity. Quick win, internal capacity will need to take on different responsibility of client function.	Working collaboratively to inform project pipeline and delivery, contractual structure could lead to more knowledge building. Pace of delivery over partnership term would increase over time.	1	4
Project Development	Collaborative, long-term project origination. SP-led projects will be financed by SP; individual authority can originate with grant or potentially blended funding. Bolstered capacity and capabilities from private sector. Contract arrangement need to establish objectives to ensure social value in origination.		1	4
Funding & Finance	Single procurement to secure commercial investment in SP. Likely innovative approaches to blending will be dependent on Client Function Team capacity and capabilities. Increased flexibility to aggregate (contract/ appetite depending),		1	3
Delivery	Single procurement for delivery route in SP (drastically shortened). Quality of delivery assured in procurement process (less flexibility to exit). Capacity/ capability to contract manage will come through Client Function. Surge of investment will increase local supply chain growth?		1	4
Community Benefit	Contract-reliant and project development reliant. Engagement likely integrated but brunt of responsibility expected to fall on YNY. Contract commitment possible to increase community energy.		1	3
Economic Opportunity	Fostering investment in regional projects drives demand for local businesses and training. KPIs to foster and support these opportunities for businesses, Client Function team responsibility?		1	3
Carbon Reduction	Pace of delivery expected to be much higher than BAU especially in short term.		1	3

Organisational Appetite Analysis



Order	Model	CA	CYC	NYC	Total
1	SP-Led Contractual	54	50*	44	148
2	Combined In-House	47	44	46*	137
3	Regional Company	48	39	44	132
4	SP-Led Corporate	47	44	35	126

*Highlights the model that is informally favoured by each organisation.

Notes / Justification

CA

Pros: Political robustness of this model considered potentially more resilient than an in-house approach (JV partnership).
Cons: Contract required to be very robust to retain control on assets of police & fire, as well as social value requirements that can be enforced.

CYC

Pros: Flexibility in contractual agreement is attractive, increased control of assets with benefit of handing off some projects.
Cons: Robust contract required to ensure just and fairness of delivery, enforcing social value, or lack thereof of social value mechanism if this is not successful.

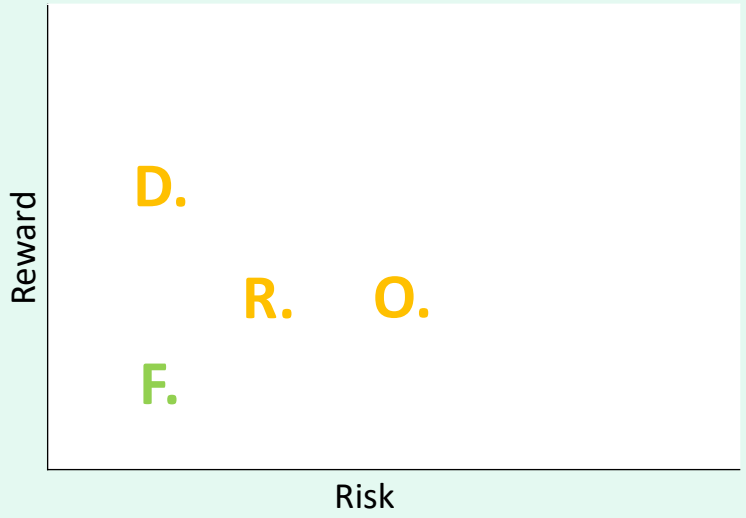
NYC

Pros: NYC recognise that some technologies, they cannot sufficiently deliver by themselves, gap for a partner to fill would be attractive.
Cons: Handing any control over to strategic partner where reward is not retained by NYC is a challenge point.

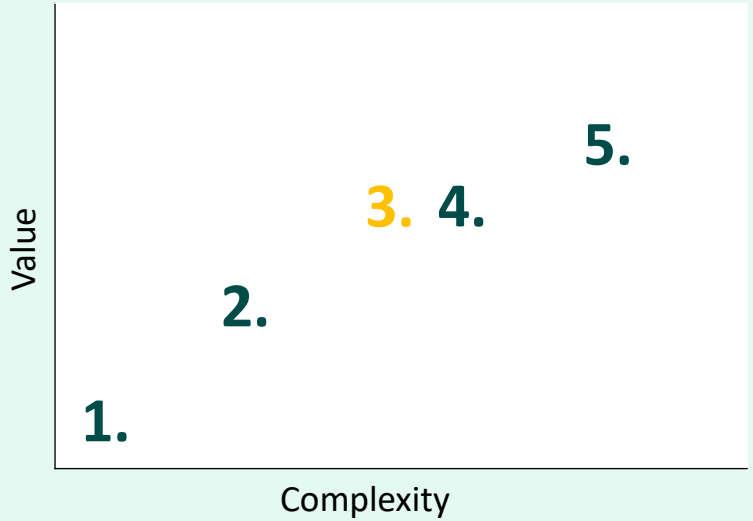
The Dual Track Contractual Model scored slightly higher in organisational appetite. The reason for this is reflected by a proposed increased capacity and separation of expertise created by procuring two partners. However, the concerns for a contractual model still apply and it is important to note that a longer procurement time may exist to create sufficient structures for an estimated 5 parties involved.

Strategic Partner-Led Contractual JV

Risk / Reward Analysis



F	Financial
R	Reputational
D	Service Delivery
O	Operational



1	BAU (Do Nothing)
2	Combined In-house
3	Contractual JV Partnership
4	Corporate JV Partnership
5	Energy Company (Max)

Theme	Detail	Risk	Reward
Financial	Likely that to enter the contractual agreement, the SP would require sufficient financial reward, from the transfer of project ownership, especially if they originated the project. Wider negotiations on project-by-project basis.	Low	Low
Reputational	Holding the SP accountable comes entirely from the contractual agreement, both parties will share reputational risk in a flexible contract.		Moderate
Service Delivery	Abortion of projects at any stage will likely be due to the acceptance criteria not being met. SP bears greater project development risk, but the pace of capacity allows for greater pace of action and thereby delivery.	Low	High
Operational	The flexibility of the contractual JV allows for each party to retain more control over its own operations and assets. Smooth operation relies on robust trust building between partners and contract arrangements.		Moderate

Complexity vs. Value	Mitigation & Dependencies
• A complex governance framework between all three YNY authorities and the SP would be required. • One single procurement to obtain a or multiple SP(s).	• To mitigate some risks a robust contractual arrangement is required that holds the SP accountable and does not allow them to cherry-pick or underperform. • Robust gateway processes and risk/reward negotiation frameworks required to ensure efficient and successful project delivery.

Strategic Partner-Led Contractual JV

Qualitative SWOT Analysis

Both Joint Venture Model Options will have similar advantages and limitations, of the following points those highlighted in **ORANGE** demonstrate the SWOT elements that are specific to the Strategic Partner-Led Contractual Joint Venture Model.

Strengths

- **Reduced Financial Exposure:** The strategic partner will take the lead in funding and managing risk associated with originating and commercialising projects, reducing contribution and exposure for the authorities.
- **Strategic Control:** Each party retains more control over its own operations and assets, appropriate structuring of contract mechanisms will allow for differing control and oversight as well as incentivise the right behaviours.
- **Combined Expertise:** The partnership will present opportunities to leverage combined experience and resources of both the public and private sector. Especially with private sector taking a lead on project development.

Weaknesses

- **Mutual Commitment:** Entering a robust contractual arrangement requires robust trust building and shared goals to ensure mutually beneficial results are achieved. The contractual nature of this model makes this element weaker than a corporate structure.
- **Incentives & Accountability:** Weaker contract arrangements and misaligned incentives may result in a suboptimal performance and outcomes for the partnership in particular, social value outcomes.

Opportunities

- **Flexibility:** The model is easier to set up and dissolve; as well as this closer collaboration and contract arrangements can allow for increased flexibility on a case-by-case basis.
- **Access to Innovation:** The partnership will benefit from private sector innovation and efficiency, potentially leading to more effective solutions.
- **Pace and Scale:** An initial influx of private expertise to bolster internal capacity and overall increased capabilities, would increase the pace and scale of delivery, considering the ability to act on economies of scale.

Threats

- **Strategic misalignment:** Differences in priorities and objectives between the Strategic Partner and YNY may lead to conflicting strategies, undermining the effectiveness of the partnership.
- **Legal and Procurement Challenges:** Navigating complex legal frameworks and procurement processes whilst considering APS may increase costs and time required for the procurement.

Strategic Partner-Led Corporate Joint Venture

Strategic Partner-Led Corporate JV

Justification of Inclusion & Model Summary

A corporate joint venture involves establishing a new jointly owned company (a separate legal entity) in which the YNY authorities and a strategic partner enter into a concession agreement in which some degree of right to operate on public assets or services is passed to the strategic partner for a specified period. For example, Bristol City Council entered into an agreement which granted their strategic partner first right of refusal over all council decarbonisation projects for a 15-year period, thereby creating the joint venture Bristol City Leap. The strategic partner will take a leading role in originating and developing projects and will be responsible for funding and managing the risks associated with commercialising these projects. The YNY authorities will contribute on a case-by-case basis (either financially or non-financially).

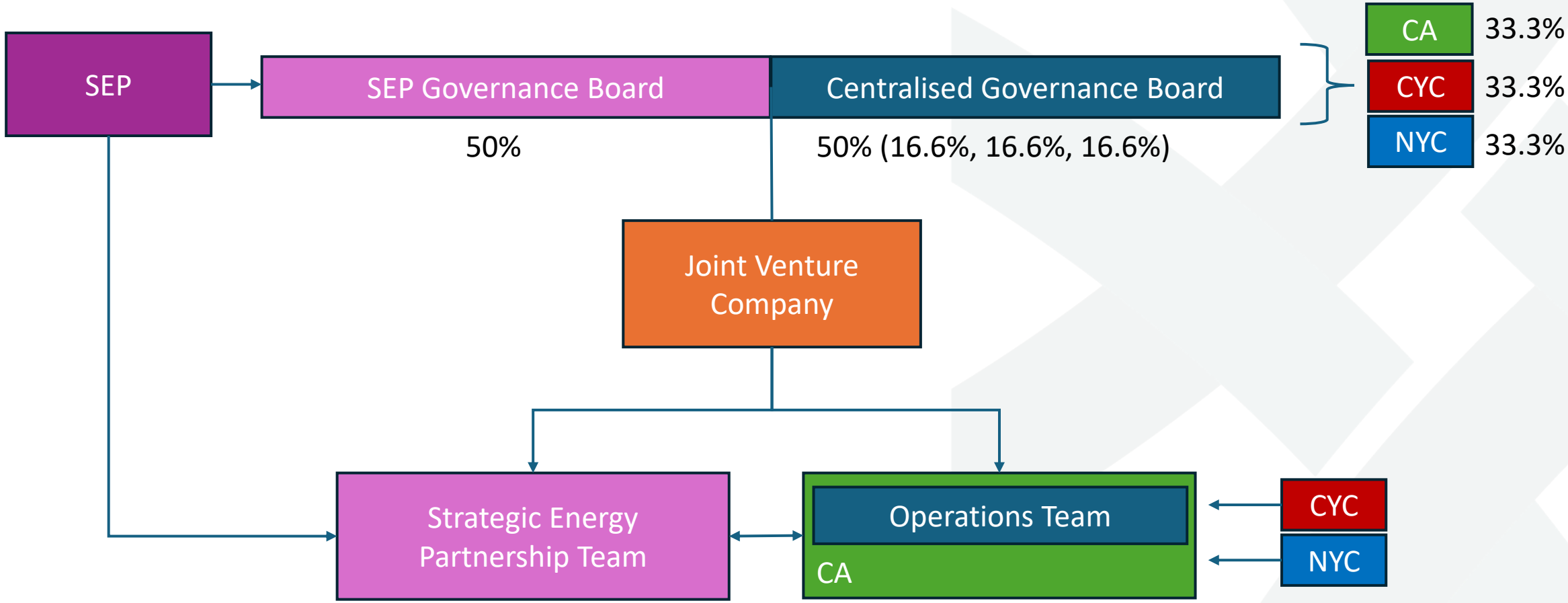
An operational team is exclusively made up from resource from the Strategic Partner, supported by a YNY Client Function that will ensure activities are occurring within the premise of the concession agreement. This team will also develop and follow a set Gateway Process and Project Acceptance Criteria that the strategic partner can submit projects to.

This model has been included within this options appraisal due to the initial objectives of this pilot to assess whether Bristol City Leap, a strategic partner-led corporate JV public-private partnership model, is replicable for this region.

Structure	Resource
A Partnership Board would be created between YNY and the Strategic Partner to become the decision-making body, responsible for approvals of: • Business Plans • Final Investment Decisions • Project Proposals related to YNY assets The Governance route taken will differ depending on project life (e.g. grant funded, commercial opportunity, community) The Client Function team would be based within the CA with supporting officers from NYC and CYC.	**Client Function Team (new entity)** • SLAs will be required for back-office services provided by the Council • After a few years of activity Bristol City Leap currently have 23 employees, typically requires more resource than a contractual JV depending on scope. FTE and financial implications should be scaled accordingly. **Align Property Services** Market engagement analysis suggests most strategic partners are open to working with APS but require • Clarity over scope • Aligning governance and approvals • Assurance on APS capabilities and resource

Strategic Partner-Led Corporate JV

Model Summary: Structure



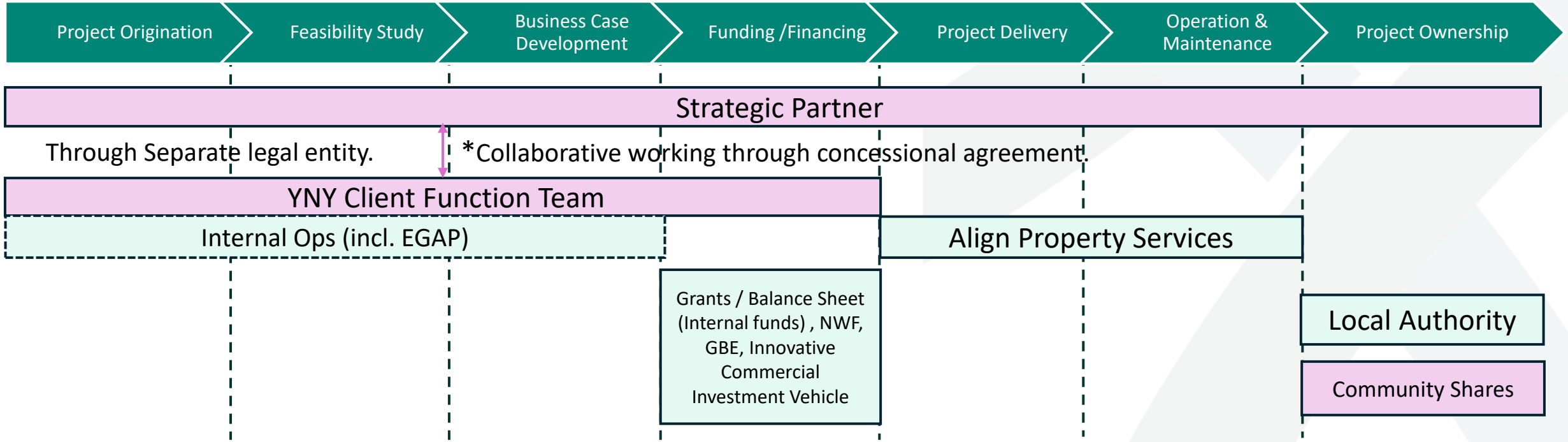
Strategic Partner-Led Corporate JV

Typical Project Route

Key	
	BAU
	Model Specific
	Other

Project Route

1. Project Originated most likely by Strategic Energy Partner, but also could come from Local Authority or Client Function Team
2. Client Function Team assess project according to approval and gateway process, agreeing details at a project level with Strategic Energy Partner.
3. If approved, the business case is developed by the Strategic Partner.
4. The business case is taken to the Joint Governance Board for approval.
5. If approved, the project is delivered by the Strategic Partner with overview from the Client Function Team.



Strategic Partner-Led Corporate JV

Other Notable Considerations

Bristol City Leap Learnings

As part of YNY's Local Net Zero Programme Pilot, Bristol City Leap have provided advisory services through a Service Level Agreement. This page summarises key points of learnings taken from Bristol City Councils journey to set up Bristol City Leap and their partnership with Ameresco and Vattenfall. Most crucially, Bristol City Leap highlighted the importance of creating a sufficient mobilisation phase to create capacity to handover projects, a robust process is needed to complete this to ensure the process is efficient and risk-reward distribution between parties are correct. As well as this, Bristol City Leap highlighted the importance of the contract and negotiation phase of partnership to leverage as much as possible before the contract is signed. Some elements of this contract include:

- Right of first refusal
- Project approval process
- Subcontracting and benchmarking
- Obligations on parties for partnership working and consents
- KPIs
- Annual processes – business plan, VfM audit, authority share payment calculation
- Reporting and Information

Community Engagement & Delivering Social Value

- Being clear about the tole of social value and community engagement in objectives and desired outcomes gave the project team a strong position going into procurement negotiations to push bidders hard on social value KPIs. (There is a financial consequence if these are not met) and to include additional protections around fair and transparent pricing.

- When designing evaluation questions, it is important to consider not just the monetary value of social value KPIs, but also the substantive benefit. For example, while one off engagements may tick a "number of volunteer hours" contributed box, the same number of hours spent as part of a long term well thought through programme to bring young people into green jobs is far more impactful.

Establishing Bristol City Leap

- A multi-stage procurement enabled Bristol City Council to refine its approach as more detail was known, and to test with bidders what would be commercially acceptable to the market.
- Procuring a strategic partner under the Concession Contract Regulations gave the council a greater degree of flexibility over the procurement process itself than other regulated procurement routes.

- The mobilisation period was extremely short, and insufficient resource was applied to that period to enable a smooth transition to stand up. For example, ideally the team would have worked through a practice project to ensure the proposed governance routes worked in practice. This didn't happen and consequently some early projects took longer than expected to move into contract.

Strategic Partner-Led Corporate JV

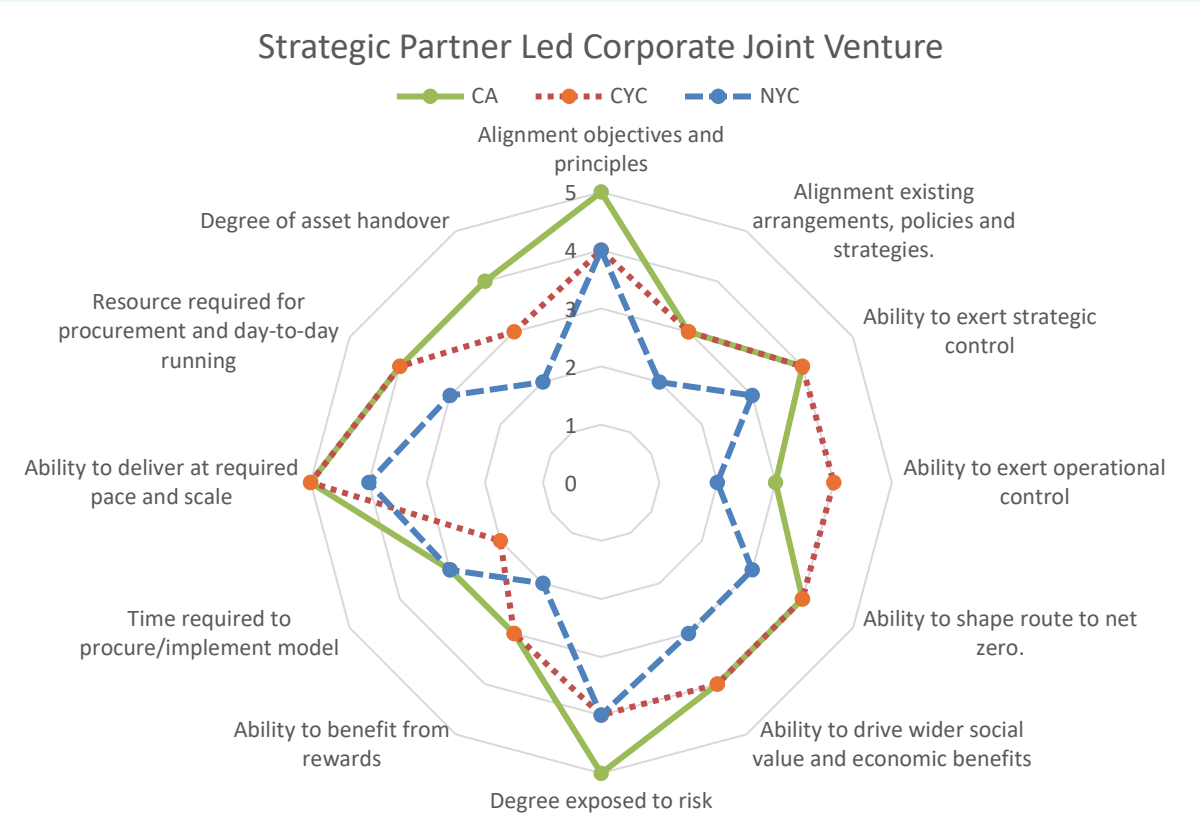
Strategic Objectives Analysis

Total (out of 35)	28

Theme	Summary		BAU	Score
Governance	Legal entity has inherently robust governance routes, joint strategic board. Ability for variation. Shareholder rights considers potential longevity beyond model term. Would certain projects still need to go through individual governance?		1	4
Capacity & Capabilities (Short & Long Term)	Initial influx of private expertise to bolster internal capacity. Quick win, internal capacity will need to take on different responsibility of client function.	Potential separation of responsibilities between SP and YNY would reduce longevity of knowledge share, but pace of delivery over partnership term would increase over time.	1	4
Project Development	Collaborative, long-term project origination. SP-led projects will be financed by SP; individual authority can originate with grant or potentially blended funding. Bolstered capacity and capabilities from private sector. Concession agreement need to establish objectives to ensure social value in origination.		1	4
Funding & Finance	Increased ability to aggregate and bundle over longer-term partnership. Committed resources to bundle will likely need to be committed from the beginning. SP onboard has access to commercial investment. Capacity and capability to blend funding will be dependent on Client Function Team ability.		1	3
Delivery	Long-term commitment to SP-lead on delivery, assured quality through procurement. Capacity to contract manage comes from Client Function. Procurement length drastically shortened. Surge of investment will increase local supply chain growth?		1	4
Community Benefit	Formal process for recording KPIs, risk of SP cherry-picking type of social value. Engagement likely integrated but brunt of responsibility expected to fall on YNY. Commitment from SP can result in larger community energy result.		1	3
Economic Opportunity	Fostering investment in regional projects drives demand for local businesses and training. KPIs to foster and support these opportunities for businesses, Client Function team responsibility?		1	3
Carbon Reduction	Long-term strategic delivery, private sector expertise, pace faster than BAU.		1	3

Strategic Partner-Led Corporate JV

Organisational Appetite Analysis



Order	Model	CA	CYC	NYC	Total
1	SP-Led Contractual	54	50*	44	148
2	Combined In-House	47	44	46*	137
3	Regional Company	48	39	44	132
4	SP-Led Corporate	47	44	35	126

Notes / Justification

CA

Pros: CA comfortable with strategic partner taking on associated risk and delivery responsibilities associated with a first right of refusal as long as Fire & Police requirements are understood.
Cons: Possible political pressure to implement model sooner and demonstrate progress/delivery quicker. CA want to retain robust strategic control.

CYC

Pros: More flexible to different asset arrangements, to accelerate project funding and delivery.
Cons: A 2.5+ year procurement and mobilisation phase would leave less than 2 years before CYC's 2030 net zero target. Want greater influence over delivery and the integration of social value.

NYC

Pros: A strategic partner would promote focused development of NYC project pipeline. Increased pace of project origination and development.
Cons: A first right of refusal agreement is not preferred; there is a hesitation around granting exclusivity rights regarding retaining reward and the inclusion of teckal Align Property Services.

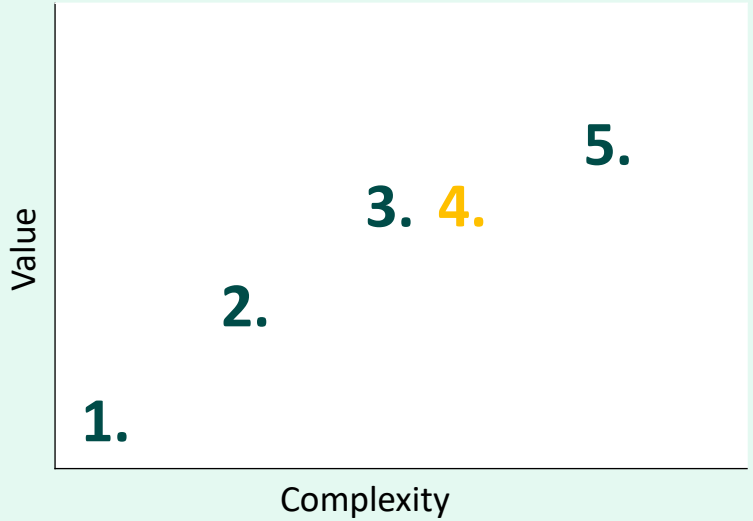
This model best demonstrates how stakeholder opinions vary between the local authorities, regarding a desire for self-delivery versus the desire for increased pace and delivery.

*Highlights the model that is informally favoured by each organisation.

Strategic Partner-Led Corporate JV

Risk / Reward Analysis

F	Financial
R	Reputational
D	Service Delivery
O	Operational



1	BAU (Do Nothing)
2	Combined In-house
3	Contractual JV Partnership
4	Corporate JV Partnership
5	Energy Company (Max)

Theme	Detail	Risk	Reward
Financial	Through transfer of project risk, levels of financial reward for successful project is also transferred. Specific projects may be open for risk/reward negotiations. As part of a concession – possible to ensure concession payment to YNY but will depend on quality of offer by YNY to SP.	Low	Low
Reputational	Holding the SP accountable comes entirely from the agreement, both parties will share reputational risk in a flexible contract. Branding may be unique but will have authorities and SP behind it.		Moderate
Service Delivery	SP leads origination, development and delivery, YNY holds SP accountable through KPIs in contract and gateway process, pace of delivery is considerably faster.	Low	High
Operational	YNY will have less control over day-to-day operations, with considerably more over strategic decisions.	Low	Moderate

Complexity vs. Value	Mitigation & Dependencies
• Likely a complex long-term process due to negotiation and long-term commitment from both parties. • Single procurement very likely.	• To mitigate some risks a robust contract is required that holds the SP accountable and does not allow them to cherry-pick or underperform. • Robust gateway processes and risk/reward negotiation frameworks required to ensure efficient and successful project delivery.

Strategic Partner-Led Corporate JV

Qualitative SWOT Analysis

Both Joint Venture Model Options will have similar advantages and limitations, of the following points those highlighted in **ORANGE** demonstrate the SWOT elements that are specific to the Strategic Partner-Led Corporate Joint Venture Model.

Strengths

- **Reduced Financial Exposure:** The strategic partner will take the lead in funding and managing risk associated with originating and commercialising projects, reducing contribution and exposure for the authorities.
- **Strategic Control:** Each party retains more control over its own operations and assets, appropriate structuring of contract mechanisms will allow for differing control and oversight as well as incentivise the right behaviours.
- **Combined Expertise:** The partnership will present opportunities to leverage combined experience and resources of both the public and private sector. Especially with private sector taking a lead on project development.

Weaknesses

- **Incentives & Accountability:** Weaker contract arrangements and misaligned incentives may result in a suboptimal performance and outcomes for the partnership in particular, social value outcomes.
- **Dependence:** The authorities would depend heavily on the partner's performance since it only has limited control over daily operations which may result in misalignment of goals.

Opportunities

- **Access to Innovation:** The partnership will benefit from private sector innovation and efficiency, potentially leading to more effective solutions.
- **Pace and Scale:** An initial influx of private expertise to bolster internal capacity and overall increased capabilities, would increase the pace and scale of delivery, considering the ability to act on economies of scale.
- **Contract Considerations:** The set-up of this model is very complex and requires the consideration of multiple dependent factors that will ultimately impact the success of SEP delivery, most importantly accountability and KPIs.

Threats

- **Strategic misalignment:** Differences in priorities and objectives between the Strategic Partner and YNY may lead to conflicting strategies, undermining the effectiveness of the partnership.
- **Legal and Procurement Challenges:** Navigating complex legal frameworks and procurement processes whilst considering APS may increase costs and time required for the procurement.
- **Reduced Flexibility:** Harder to exit or restructure without legal and financial implications

Regional Company (Do Maximum)

Regional Company (Do Maximum)

Justification of Inclusion & Model Summary

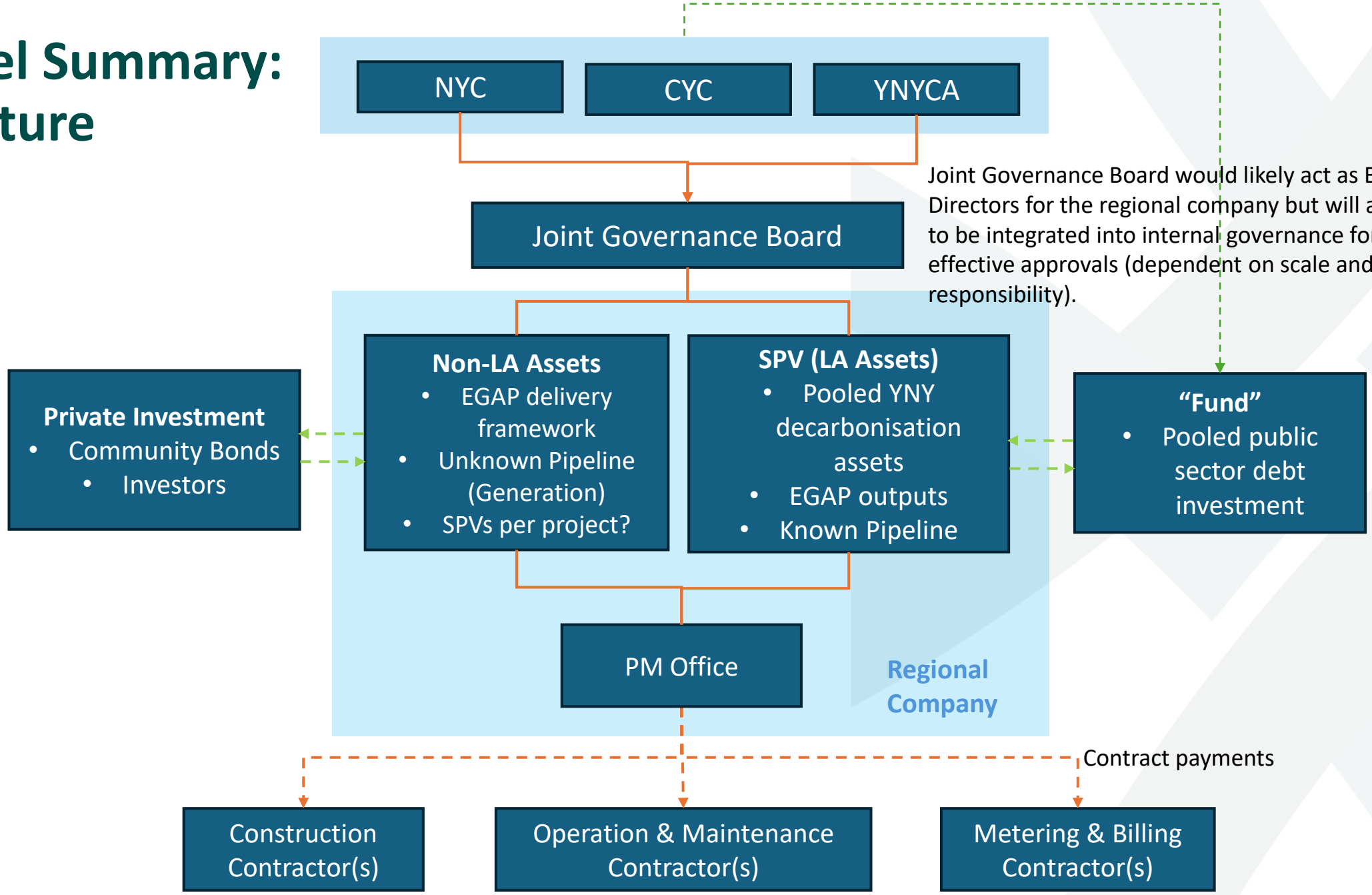
A distinct company, likened to an in-house model ringfenced legally, would be dedicated to activities from origination to contract management and community engagement. At the forefront of company decisions would be an owner-operator investment-minded priority. The goal being to utilise commercially viable projects to generate revenue and use this to subsidise non-viable projects via a revolving fund whilst simultaneously providing direct benefits for authority core services.

The model requires significant investment, exploring arising opportunities from GB Energy, NWF and other private investment, to support the actions of a series of legally distinct SPV investment into commercially viable energy generation.

This model was included after iterative reflection into the shortlist, answering a need for a model that could fulfil all criteria to the fullest they could possibly be whilst considering the regions desire and track-record for self-delivery. This model termed the 'maximum ambition model' was created to demonstrate how mayoral and regional priorities could be undertaken in-house to retain all benefits possible.

Structure	Resource
Separate entities combined into model: **Regional Company**: in-house model ring-fenced legally, provides services to support energy project development and delivery. Dedicated PM office to manage contracts. **Fund:** LA assets likely to only be funded through a publicly raised "fund". Whereas non-LA assets or those with commercial viability are the ones likely to funded through private investment. LP development according to pipeline development. **SPVs:** Where applicable legally distinct SPVs raised to allow wider investment / financing options (isolating financial risk). **Joint Governance Board**: Created from NYC/CYC/CA membership. Blend at fund level rather than delivery.	**Company:** £800k - £1mil per year for functions: project development, management of energy assets/contracts, raising of capital etc. Large dedicated team. **Funding:** Requires significant Cornerstone Investment **Project Pipeline**: Successful pipeline requires knowledge of pipeline to understand what the Company will likely deliver first, leading into setting fund criteria.

Model Summary: Structure



Regional Company (Do Maximum)

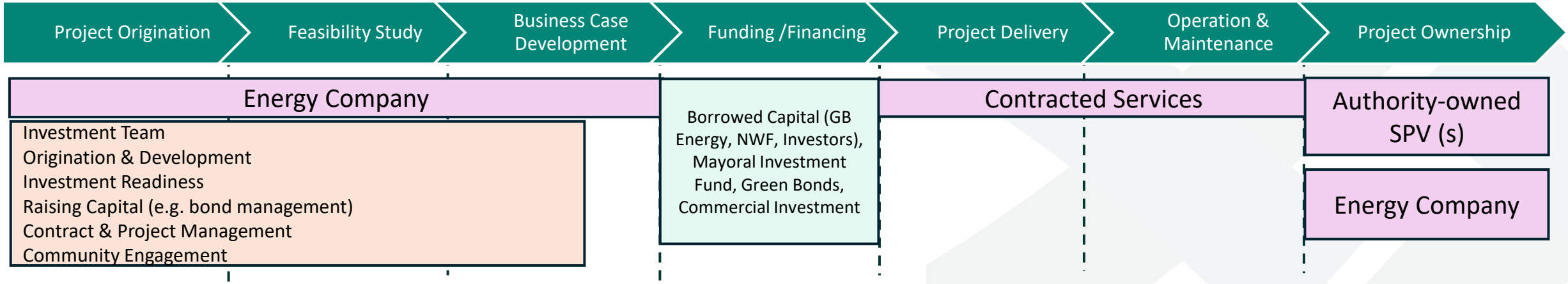
Typical Project Route

Key	
	BAU
	Model Specific
	Other

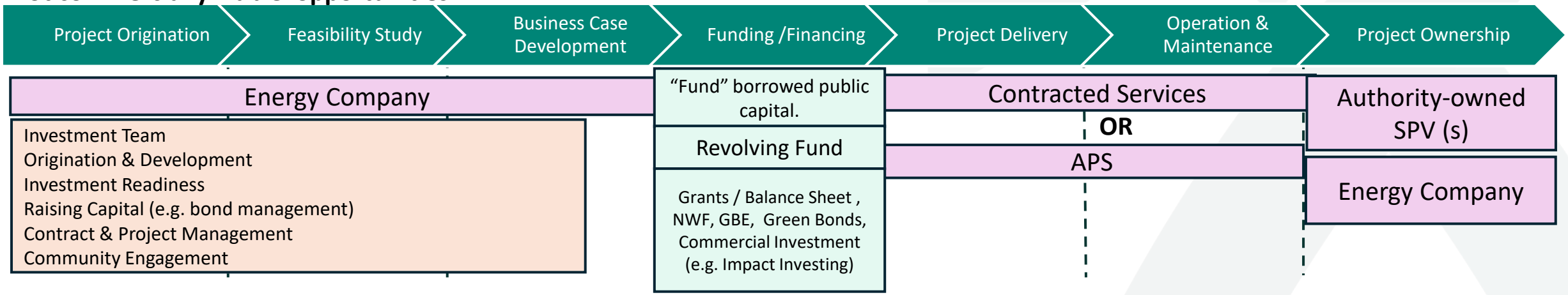
Project Route

1. Project originated and worked up to business case by the internal team dependent on requirements (specialisms contracted appropriately).
2. Route of delivery taken to Joint Governance Board, to confirm investment and delivery pathway.
3. Company contract manages directly or indirectly through SPV if appropriate to raise.

Commercially viable opportunities:



Not commercially viable opportunities:



Regional Company (Do Maximum)

Other Notable Considerations

The following feedback and questions remain regarding this model and ultimately whether this is the most efficient way ‘maximum ambition’ could be achieved for York and North Yorkshire.

Question/Feedback	Detail/Discussion
One SPV rather than multiple (SPV per project)	If consideration is existing pipeline (authority assets) initially, no project is big enough or has a significant commercial case worth raising an individual SPV over. One SPV for all projects would more likely be used to pool assets to raise debt investment for all. This changes if we own and operate large commercial projects, however you wouldn’t recommend this why?
Equity Investor rather than Owner/Operator	Investment into energy generation ownership stakes/shares to retain future company profits. The volatile and uncertain market as well as rising interest rates, higher borrowing costs and lack of capacity in the grid to accept new renewables generators. Evidence from Warrington Borough Council, owner/operator of three solar farms. They have £87 million of loans invested in its solar farms but due to its investment decisions and conditions are £1.8 billion in debt. Question: Does this limit the larger scale profit expected from retaining self-delivery? Require more detail on how this would work? From borrowed capital?
SPV may not be eligible for LP Fund investment.	An SPV containing authority assets (existing pipeline) to pool resources are difficult to finance. An LP Fund that chooses to invest in an SPV is possible. It will depend on the investment policy that meets the needs of the local authority but also the private capital. What in particular about private requirements? It may be difficult to align those criteria with additional risks of LP funds needing oversight and verification of Suppliers/PM delivery. LP Fund could invest in SPV but very unlikely that they would, due to being blind to the investment. Could you expand on blind to the investment
Why a “fund” rather than LP Fund?	It is more likely due to the pooled assets (most of which are not commercially viable), that the financial vehicle for this model would be an accumulation of public capital. This “Fund” is a pool of public sector money used to deliver projects.
What are the implications of a “fund” (e.g. GLA/NWF) and why is it not a fund?	Limited Partner funds are legal structures to pool capital from multiple investors to be professionally managed by its general partner to generate returns for investors. Whereas this “fund” is a consolidation of various public sector loans into a single entity, most likely from NWF. Both must deliver a positive financial return, but the “fund” is over a longer term with a lower IRR.

Regional Company (Do Maximum)

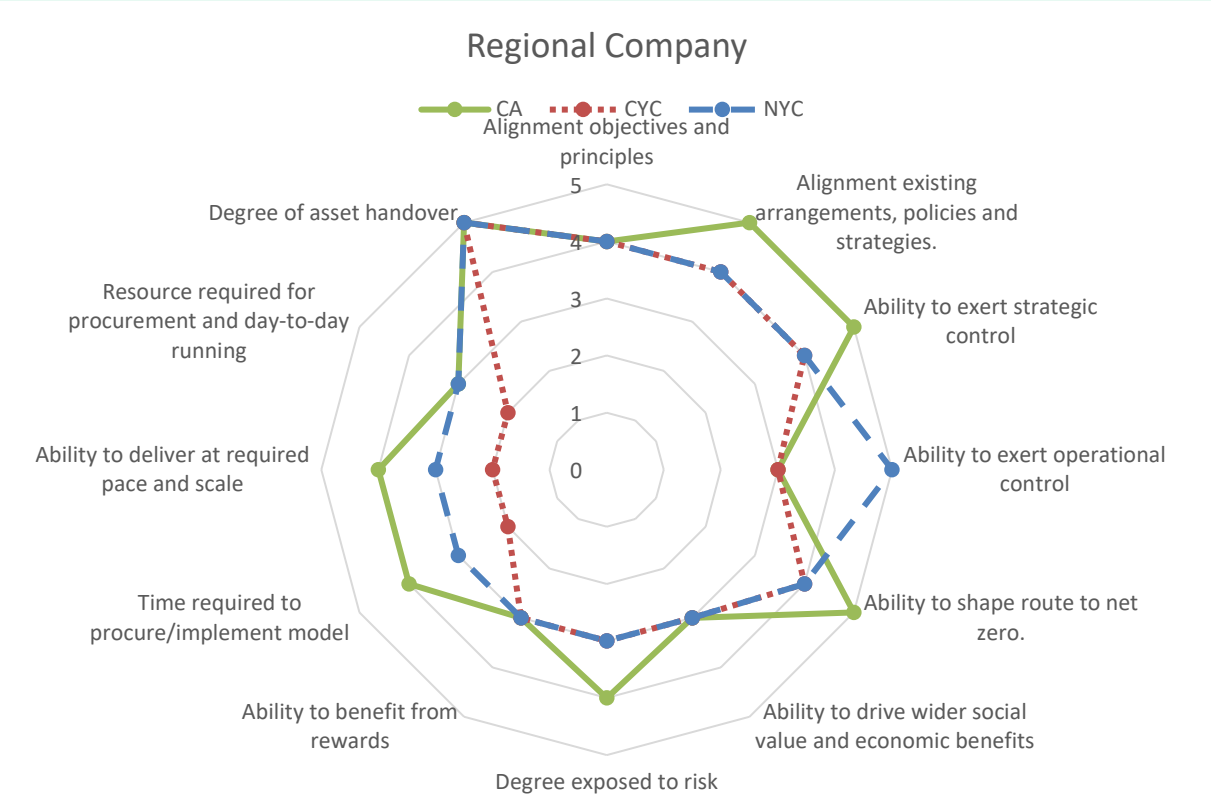
Strategic Objectives Analysis

Total (out of 35)	31

Theme	Summary		BAU	Score
Governance	Is a legally distinct entity, public authority can still maintain a degree of control as a shareholder. Can also form initial governance framework to shape strategic direction of SPV going forward. Flexibility from political uncertainty, as less likely to be viewed as financially or legally risky operation.		1	5
Capacity & Capabilities (Short & Long Term)	Requires extensive set-up, initial capacity would be to scale existing programmes like EGAP. Operating on project-by-project basis and may take longer to fulfil investment opportunity in large-scale project.	Retained expertise within LA would increase significantly. Retention of employees through running of profitable venture.	1	3
Project Development	Will require capacity to be built over time into a profitable venture. Start-up phase may see a reliance on commercially viable 'quick wins' to build up portfolio and generate revenue. Revolving fund of revenue will provide long-term project development function. Wholly-owned provides strategic advisory role to be realised.		1	4
Funding & Finance	Isolation of financial risk through SPV. Access to commercial investment and securitised debt financing. Ability to tackle larger development (high risk, high reward). Need to repay shareholders may create more profit driven business model and limit funding/appetite for commercially unviable projects.		1	4
Delivery	Legal distinction from public sector, can prioritise working with local business (not constrained by procurement regs?). Can invest in projects across the UK to support commercially unviable projects in YNY (as done by Warrington BC).		1	3
Community Benefit	Larger scale developments by the SPV will likely require community benefit funds to generate local support. Creation of CIC works more directly with community on less commercially viable projects, has ability to attract own investment and through funds.		1	4
Economic Opportunity	Requirement with contractor to use local suppliers. Legal distinction from public sector, can prioritise working with local business.		1	4
Carbon Reduction	Financial and legal freedoms to make large scale investments will increase pace and scale of delivery. Quick wins will result in limited asset class project delivery initially.		1	4

Regional Company (Do Maximum)

Organisational Appetite Analysis



Order	Model	CA	CYC	NYC	Total
1	SP-Led Contractual	54	50	44	148
2	Combined In-House	47	44	46	137
3	Regional Company	48	39	44	132
4	SP-Led Corporate	47	44	35	126

Notes / Justification

CA

Pros: CA wants a robust joint up governance approach and strategic overview to regional delivery, secured through the legal set up of a new company.
Cons: Likely difficult to demonstrate immediate increase in activity, and no dedicated social value mechanism.

CYC

Pros: Flexibility and strategic control of this model are attractive.
Cons: Pace of delivery increasingly important to CYC, benefits of this model do not likely balance with these associated limitations. Financial input from CYC is also likely to be limited.

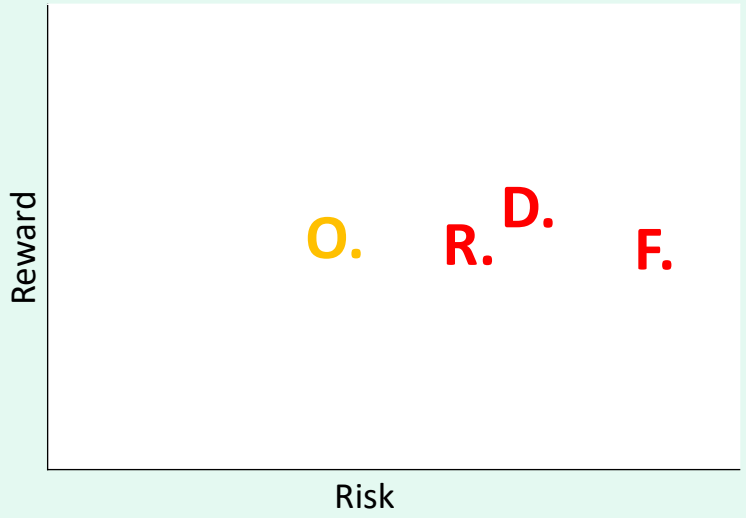
NYC

Pros: Self-delivery and ability to retain considerable reward and control is attractive to NYC.
Cons: Too many unknowns on commitment and legal structure, unsure on effectiveness of this model compared to combined in-house.

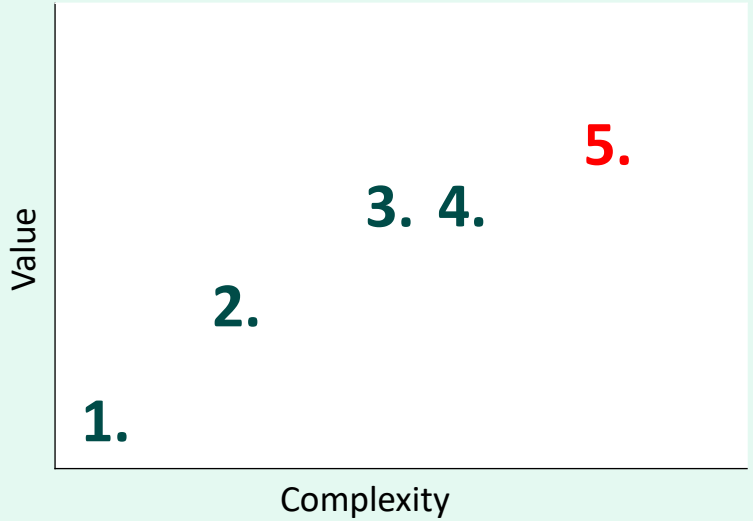
Note: 3's likely indicate that there is not enough information to make an informed judgement on the authority's appetite.

Regional Company (Do Maximum)

Risk / Reward Analysis



F	Financial
R	Reputational
D	Service Delivery
O	Operational



1	BAU (Do Nothing)
2	Combined In-house
3	Contractual JV Partnership
4	Corporate JV Partnership
5	Energy Company (Max)

Theme	Detail	Risk	Reward
Financial	Model requires significant financial investment likely from public loans or providing assurance to investors through cornerstone investment. All profit is retained without private ownership, but financial commitments will require appropriate payback.	High	Moderate
Reputational	Creation of legally distinct entity will provide some reputation protection, but considerable risk still lies with the authorities and their use of public money.	High	Moderate
Service Delivery	YNY is fully exposed to delivery risk, on a project level some delivery risk may be passed to the private sector, but contract management will remain in-house.	High	Moderate
Operational	Keeping operations in-house would expose the model to a risk of derailment if three authorities disagree or could be highly influenced by politics.		High

Complexity vs. Value	Mitigation & Dependencies
• Legal input to set up new company structure would likely be complex, new governance arrangement. • Would likely require multiple large complex procurements.	• Further exploration to understand if this is the most efficient structure for this models associated ambition.

Regional Company (Do Maximum)

Qualitative SWOT Analysis

Strengths

- **High level of Control:** The authorities retain full control and influence over project origination, delivery, and advancement towards net zero. Especially, regarding large scale energy generation, YNY will retain control and thereby impacts on communities.
- **Robust Regional Approach:** Facilitates a region-wide approach whilst supporting existing arrangements, ability to scale up existing programmes is a great advantage at upskilling and resource efficiency, especially if resource is combined into one delivery vehicle.

Weaknesses

- **Pace and Scale:** This model would likely take a significant amount of time to reach its fullest potential regarding large scale investment. Maximising economies of scale is less likely as it is dependent on the resource YNY commit.
- **Lack of market interest:** Some key strengths and opportunities associated with this model may be compromised if there is insufficient market interest or appetite.

Opportunities

- **Scaling APS:** This model could facilitate the scaling up of APS, offering an effective delivery route whilst using the procurement framework for external private expertise.
- **Government Support:** Current initiatives from GBE, DESNZ and NWF show an increased appetite to fund and support sustainable energy projects, potential opportunity to access easily using this model as evidence of delivery.
- **Dedicated PM Office:** This model facilitates a robust delivery/contract management facility that can be adaptable and flexible to different project needs. Also, could potentially provide assurance to external investors.

Threats

- **Resource Intensive:** Concerns about YNY ability to allocate the necessary resources to manage and execute projects effectively especially to the required pace and scale required to reach net zero.
- **Raising Finance:** More likely that significant finance will be raised through public loans facility.
- **Complexity:** The complexity of setting up this model is significant, could not be the most efficient way to achieve the same ambition.

Concluding Summary

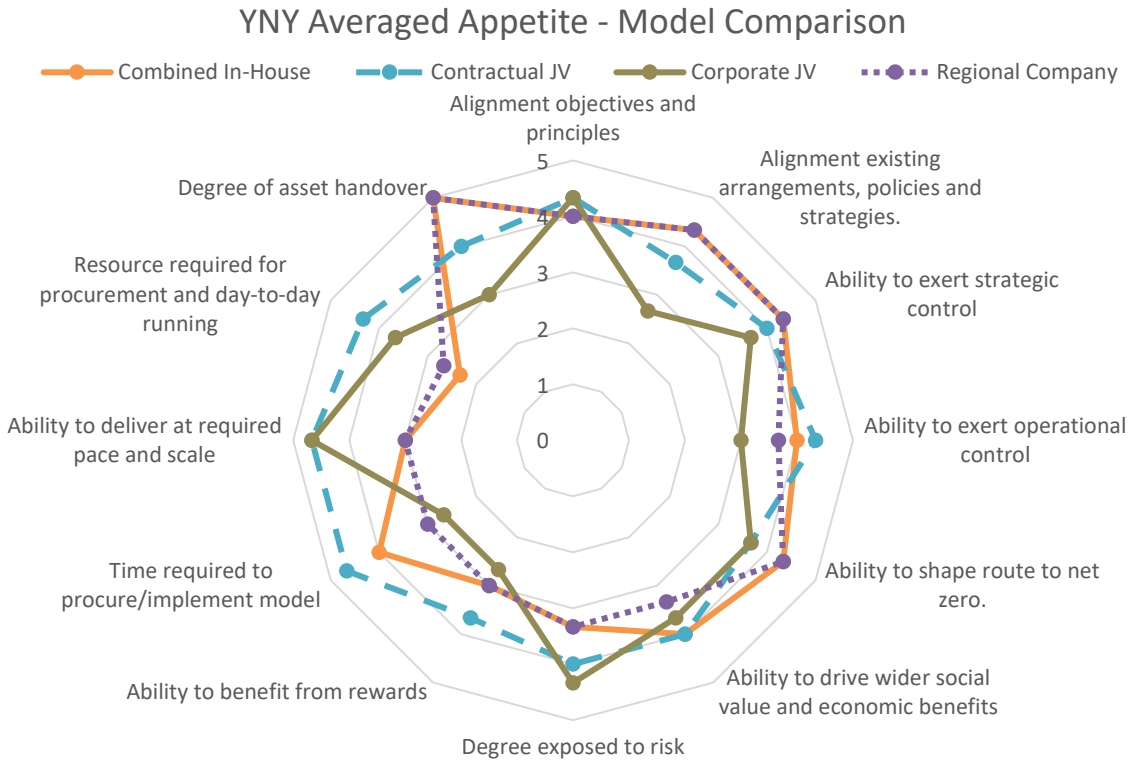
Strategic Objectives Summary

	Governance	Capacity & Capabilities	Project Development	Funding & Finance	Delivery	Community Benefit	Economic Opportunity	Carbon Reduction
Combined In-House								
Contractual JV								
Corporate JV								
Regional Company								

Note: This analysis demonstrates the potential of each model to achieve the strategic objectives, the ability of each model to achieve this potential or go further than this initial analysis will be dependent on the execution of each model. This regards quality of negotiation during procurement, robustness of contracts, robustness of governance arrangements, commitment of resource (financially, and non-financially), and effectiveness of mechanisms etc.

	Combined In-House	Contractual JV	Corporate JV	Regional Company
Advantages	**Flexibility:** The model is highly compatible with utilising different origination, funding, delivery and ownership mechanisms. Adapting to different project requirements.	**Flexibility:** The model is easier to set up and dissolve; as well as this closer collaboration and contract arrangements can allow for increased flexibility on a case-by-case basis.	**Reduced Financial Exposure:** The strategic partner will take the lead in funding and managing risk associated with originating and commercialising projects, reducing contribution and exposure for the authorities.	**Robust Regional Approach:** Facilitates a region-wide approach, ability to scale up existing programmes is a great advantage at upskilling and resource efficiency, especially if resource is combined into one delivery vehicle.
Limitations	**Potential for inconsistency:** Procurement framework approach would need monitoring on a project-by-project basis to ensure quality of delivery is consistent,	**Mutual Commitment:** Entering a robust contract requires robust trust building and shared goals to ensure mutually beneficial results are achieved. The contractual nature of this model makes this element weaker than a corporate structure.	**Dependence:** The authorities would depend heavily on the partner's performance since the model only has limited control over daily operations which may result in misalignment of goals.	**Complexity:** The complexity of setting up this model is significant, could not be the most efficient way to achieve the same ambition.

Organisational Appetite Summary



Order	Model	CA	CYC	NYC	Total
1	SP-Led Contractual	54	50*	44	148
2	Combined In-House	47	44	46*	137
3	Regional Company	48	39	45	132
4	SP-Led Corporate	47	44	35	126

Combined In-House: This model is generally well accepted across YNY and poses an opportunity to expand our business-as-usual operations without a long-term contract with the private sector. Instead focusing on joint internal mechanisms that can maximise public resources and finance. However, a major concern of this model is that without contractual commitment this model remains on a BAU trajectory in the longer term.

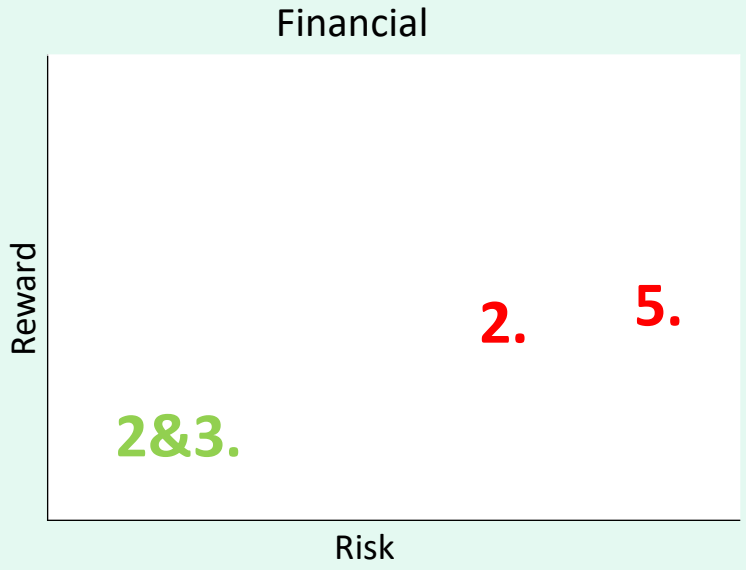
Contractual JV: This model is the highest ranking across YNY, its balance between private and public operational control is increasingly attractive to YNY, especially the local authorities. However, a risk to the success of this model will be the negotiation phase between partner and YNY to ensure both parties are happy with this share of risk/responsibility.

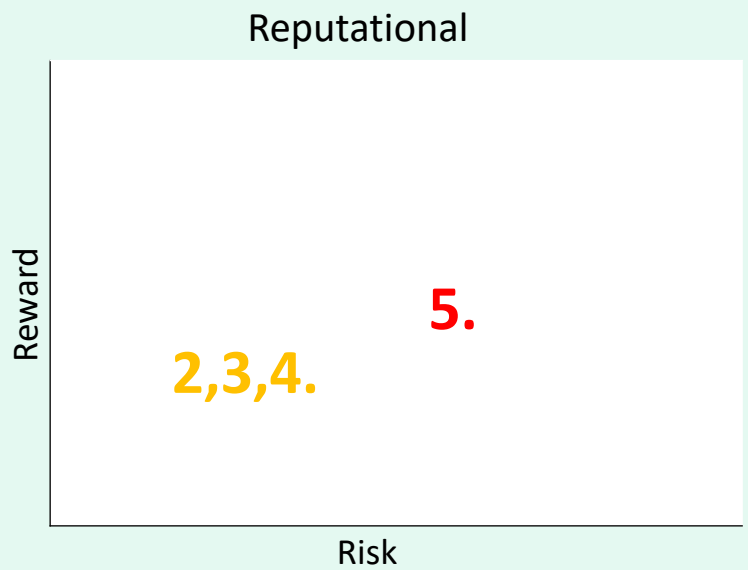
Corporate JV: This model ranks the lowest of the shortlist, the most likely reason for this is a lack of appetite towards a first right of refusal contract. CYC and the CA seem more open to this and recognise it may be required to obtain private sector expertise.

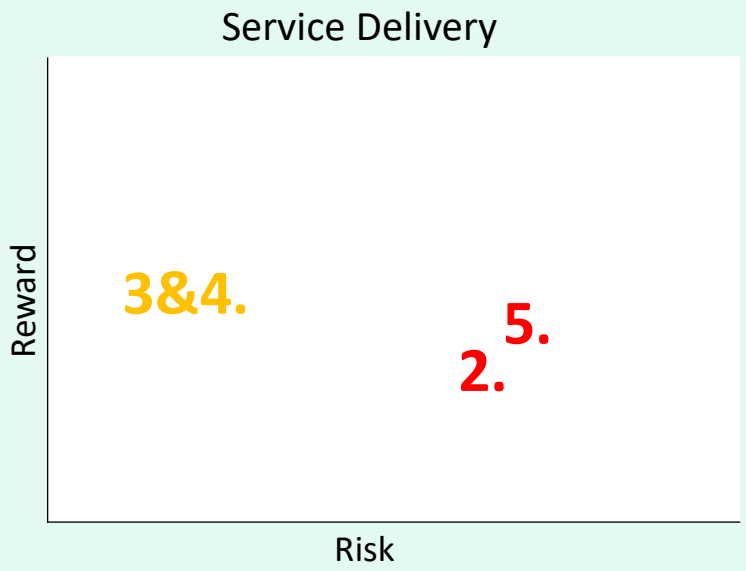
Regional Company: This appetite reflects YNY opinion to the highest risk model in terms of financial and legal commitment. CYC is most opposed to this model due to its need for pace and scale of delivery.

*Highlights the model that is informally favoured by each organisation.

Risk/Reward Summary







1	BAU (Do Nothing)
2	Combined In-house
3	Contractual JV Partnership
4	Corporate JV Partnership
5	Energy Company (Max)

Combined In-House: Risk taken on by YNY entirely, with potential to retain reward. Approach is most variable.
Contractual JV: Balance of control with the private partner leads to increased delivery pace but less financial reward.
Corporate JV: Handing over most risk to the private partner results in considerable delivery pace compared to the other models.
Regional Company: Highest risk model due to the most financial and legal commitment, however, potentially could result in the most financial benefit that YNY have the most control over i.e. into core services.

Recommendations

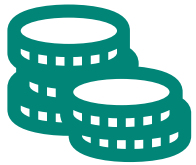
This page summarises recommendations from the Project Team for progressing the preferred model decision, and/or the programme in general.

1. It is likely all models will require common mechanisms that are applicable (with small changes) dependent on the preferred model choice. A recommendation would be to produce these common mechanisms to achieve LNZA objectives by March 2026, ensure these mechanisms inform a model choice and ensure these mechanisms have longevity. These include the following:

Governance Processes	Gateway Approvals	Ways of Working	Profit Sharing Agreements	Social Value Framework
•How will YNY make regional decisions at pace and collaboratively?	•What project requirements exist to move a project from SOC -> OA -> OBC	•How will YNY authorities practically work together moving forward?	•If applicable, how will profits be shared between YNY?	•Integration of Community Energy & enforcement framework/KPIs for social value

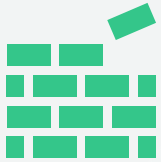
2. Questions remain from YNY regarding the below themes to inform senior decision making on the preferred model. Senior stakeholders require quantitative, evidence-based assurance regarding the impact of each model on their business as usual and what outputs will be created as a result of this programme.

Strategic Alignment & Impact



Financial and Operational Implications

Cross-working Considerations



Model Resilience

Appendix
Longlist Options Appraisal

Appendix

Overview – Heat Map

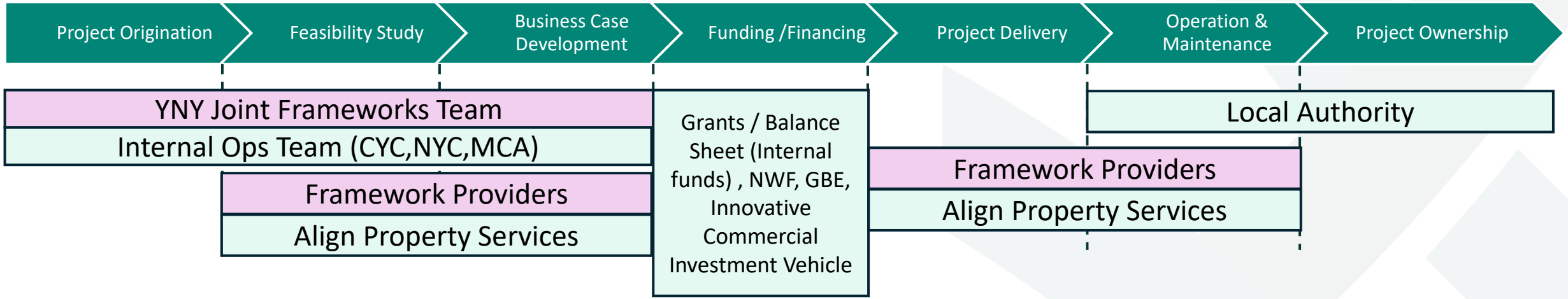
	Governance	Capacity & Capabilities	Project Development	Funding & Finance	Delivery	Community Benefit	Economic Opportunity	Carbon Reduction
Authority-Led Framework								
In-House Centralised								
In-House Scaled-Up APS								
Investment Readiness Facility								
Limited Partner Fund								
Dual Track Coventry								

Does not meet the objective at all	Meets the objective very poorly; major gaps or misalignment	Meets the objective somewhat, but with significant issues	Adequately meets the objective; some minor issues present	Mostly meets the objective; only minor improvements needed	Fully meets or exceeds the objective; no improvements needed
0	1	2	3	4	5

Appendix

Authority-Led Framework

Key
BAU
Model Specific
Other



Governance	Resource	Project Route

• Joint establishment of the framework (deciding detail and criteria).
• Individual draw down and governance routes for net zero project delivery.
	• Core Framework Team – committed full-time resource requires funding (e.g. Mayoral Investment Fund + LAs).
	  • Procurement/Legal/ Finance/Manage
	• Contracted Framework Team – grant funded allocation per project.
	  • Contract Management
	• [EY Report] States up to 30 FTE minimum (incl. contract management, legal, finance and procurement specialists)
		1. Project Originated by Individual Authority/ supported by Joint Frameworks Team.
		2. Project assessed according to framework criteria.
		3. If approved, Individual Authority or Joint Frameworks Team takes to business case (utilises framework if applicable)
		4. Business case delivery drawn down by framework delivery.
		5. Joint Frameworks Team or resource from individual authority, contract manages.

Appendix

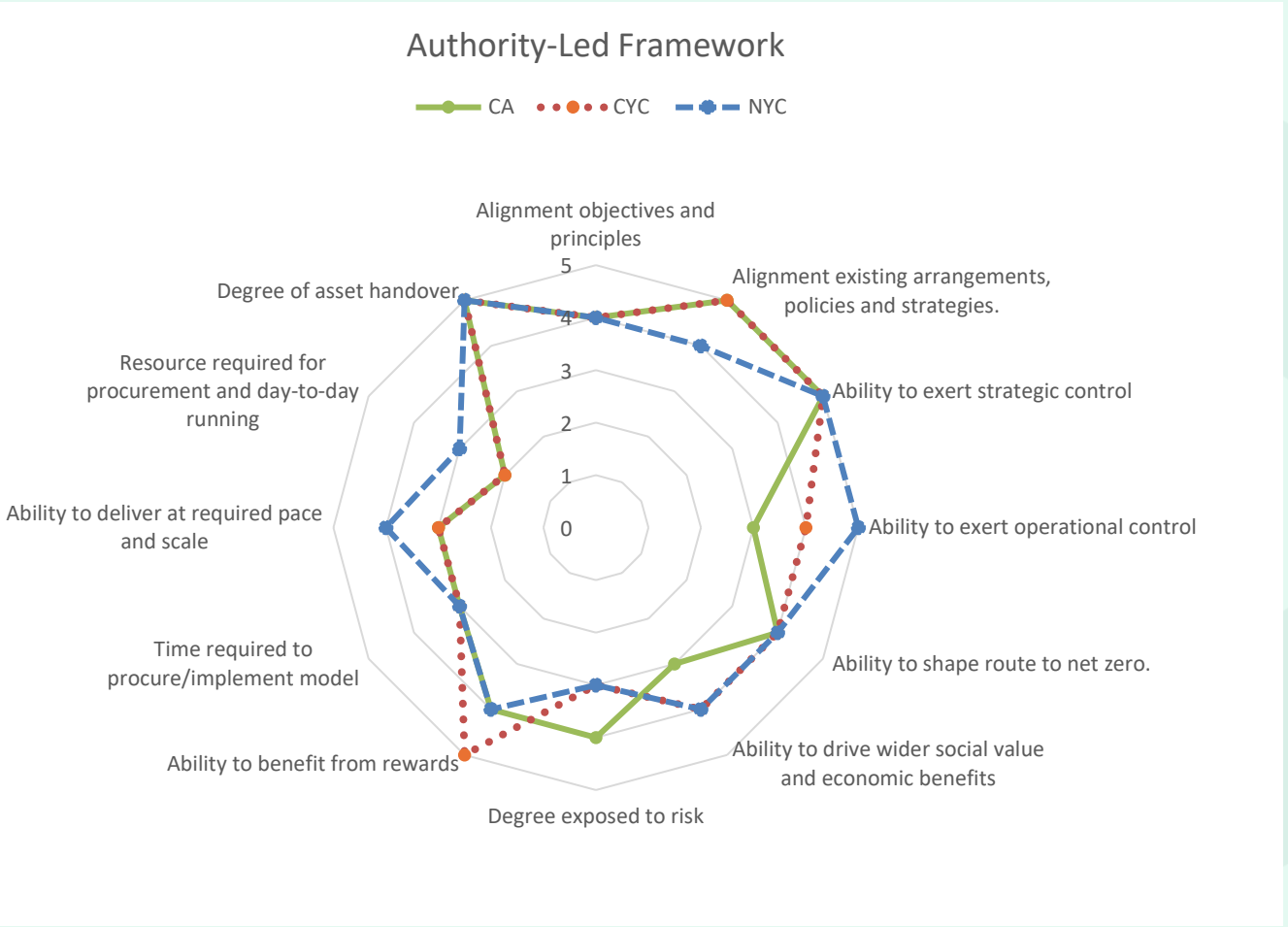
Authority-Led Framework

Total (out of 35)	10

Theme	Summary		BAU	Score
Governance	Individual authorities draw down on framework as required, BAU. Criteria of framework established jointly [EY Report]		1	1
Capacity & Capabilities (Short & Long Term)	Capacity required to set up the framework, will likely take ~1 year. BAU in meantime.	Project-by-project call off, will not meet required pace and scale. Longevity of framework is beneficial for YNY	1	2
Project Development	BAU project development functionality.		1	1
Funding & Finance	BAU as framework will likely only provide contracting for supply of services and/or works, point at which a project enters the framework will be business case (therefore likely grant funded continuation).		1	1
Delivery	Procurement process would be shorter than BAU but longer than partner arrangement and still on project-by-project basis, leading to mediocre pace of delivery. Encouragement of consortium approaches with local supply chain possible. Quality of delivery potentially would not be consistent. Capacity for contract management would depend on grant funding.		1	2
Community Benefit	BAU integration of community benefit into framework, low capacity not sufficient to engage communities widely.		1	1
Economic Opportunity	Procurement framework with requirement for consortium/dedication to local supply chain would benefit local businesses and increase demand. But limited capacity to support these businesses could result in slow engagement and therefore delivery.		1	2
Carbon Reduction	Pace and scale marginally quicker than BAU.		1	2

Appendix

Authority-Led Framework

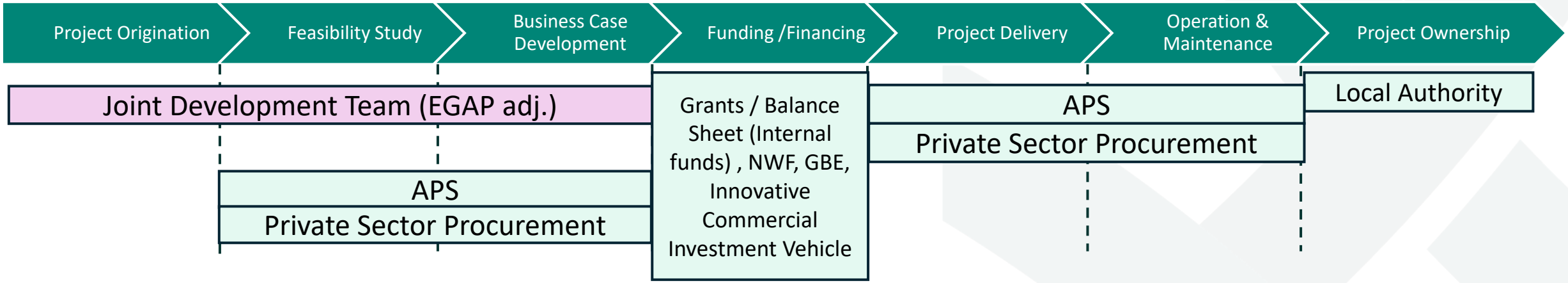


Model	CA	CYC	NYC	Total
SP-Led Contractual	45	47	48	140

Appendix

Enhanced In-House Centralised

Key
BAU
Model Specific
Other



Governance	Resource	Project Route

• Joint governance board that leads Joint Development Team.
• Delivery would be via individual authorities due to grant funding allocation on individual basis. (i.e. no funding mechanism attached)
	• EGAP scaled-up would be the Joint Operations Team, requires funding (e.g. Mayoral Investment + LAs).
	  • Project Origination & Development
	  • Capacity: £1.5 million funding over 2 years will get 3 projects to FBC, and 2 to OBC*
	• Delivery contract management completed by individual authority (grant funding).
		1. Joint Team originates project using EGAP-style programme.
		2. Project taken to joint board for approval according to regional strategy.
		3. If approved, joint team take to business case level (with private sector support likely).
		4. Project goes back to joint board for approval on delivery route.
		5. Project delivery procured and contract managed by individual authority.

* Variation applies accordingly to project complexity and type (focus on large scale generation)

Appendix

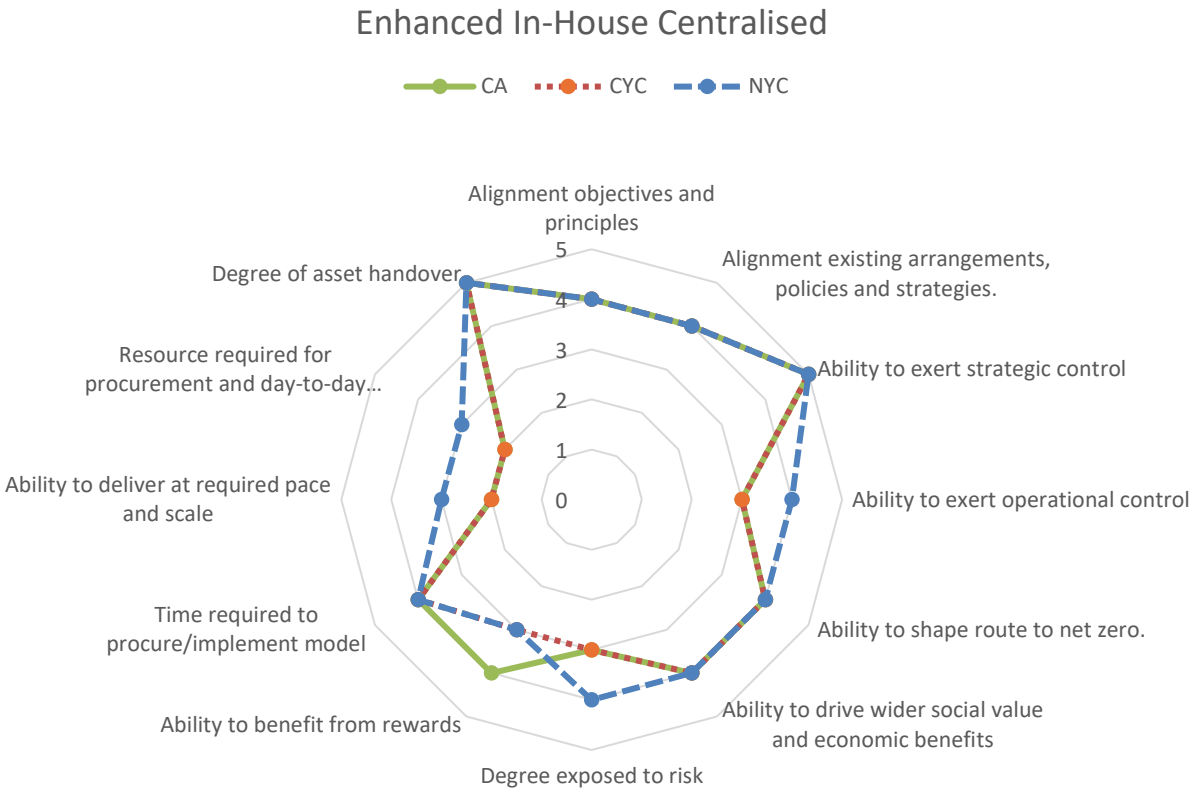
Enhanced In-House Centralised

Total (out of 35)	11

Theme	Summary		BAU	Score
Governance	Utilises joint governance board, decisions are made collaboratively based on regional priorities and strategic goals. Decisions would still be made on project-by-project basis, and individual authority policies before this route may lead to inefficiencies.		1	2
Capacity & Capabilities (Short & Long Term)	Scaling up EGAP initially would provide services for development, delivery and community engagement. Operating on project-by-project basis.	Natural increase of demand may increase needed capacity, but no consistent delivery route would result in slower pace of delivery required.	1	2
Project Development	Dedicated regional project development team through committed funding from YNY. In-house team can integrate social value better with increased capacity, but existing funding situation remains and reliance on project-by-project basis.		1	2
Funding & Finance	Joint capacity to bid but little expertise to blend finance. BAU access to commercial investment, capacity and capabilities.		1	1
Delivery	Due to mainly grant funded, individual authority will likely delivery through BAU project-by-project basis. Overall capacity therefore is BAU, resulting in slow delivery.		1	1
Community Benefit	Joint team can enable strategic approach in project development but BAU capacity/capabilities and ad-hoc delivery would likely result in marginal results.		1	2
Economic Opportunity	BAU, project-by-project procurement gives little opportunity to grow local supply chain.		1	1
Carbon Reduction	Pace and scale marginally quicker than BAU.		1	2

Appendix

Enhanced In-House Centralised

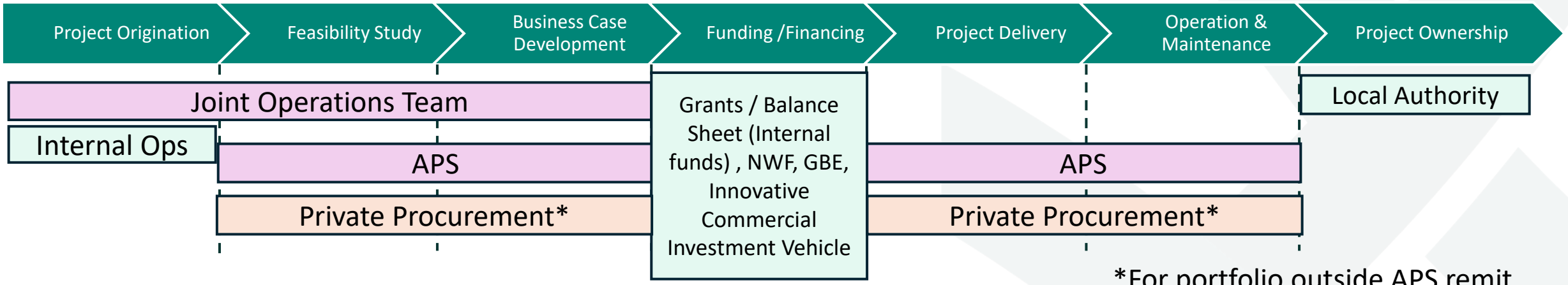


Model	CA	CYC	NYC	Total
Enhanced In-House Centralised	44	43	47	134

Appendix

Enhanced In-House Scaled-Up APS

Key
BAU
Model Specific
Other



*For portfolio outside APS remit

Governance	Resource	Project Route
• Align create third-arm (Teckal) with shareholders from CA, CYC, NYC. • Case Study: Yorwaste (in appendix)	• Joint Operations Team created as Client Function for APS. requires funding (e.g. Mayoral Investment + LAs). • APS Third-arm would likely require balance sheet funding from CA and CYC to scale-up. • Contract management FTE grant funded.	1. Project Originated by Individual Authority or Joint Operations Team. 2. Joint Operations Team collaborate with APS to assess project relevance to third-arm shareholder set priorities. 3. APS undertake feasibility and take to business case with Joint Operation Team. 4. Individual Authority approval process. 5. APS deliver project. 6. If APS is unable to provide required support/expertise, alternative private sector support procured by joint operations team.

Appendix

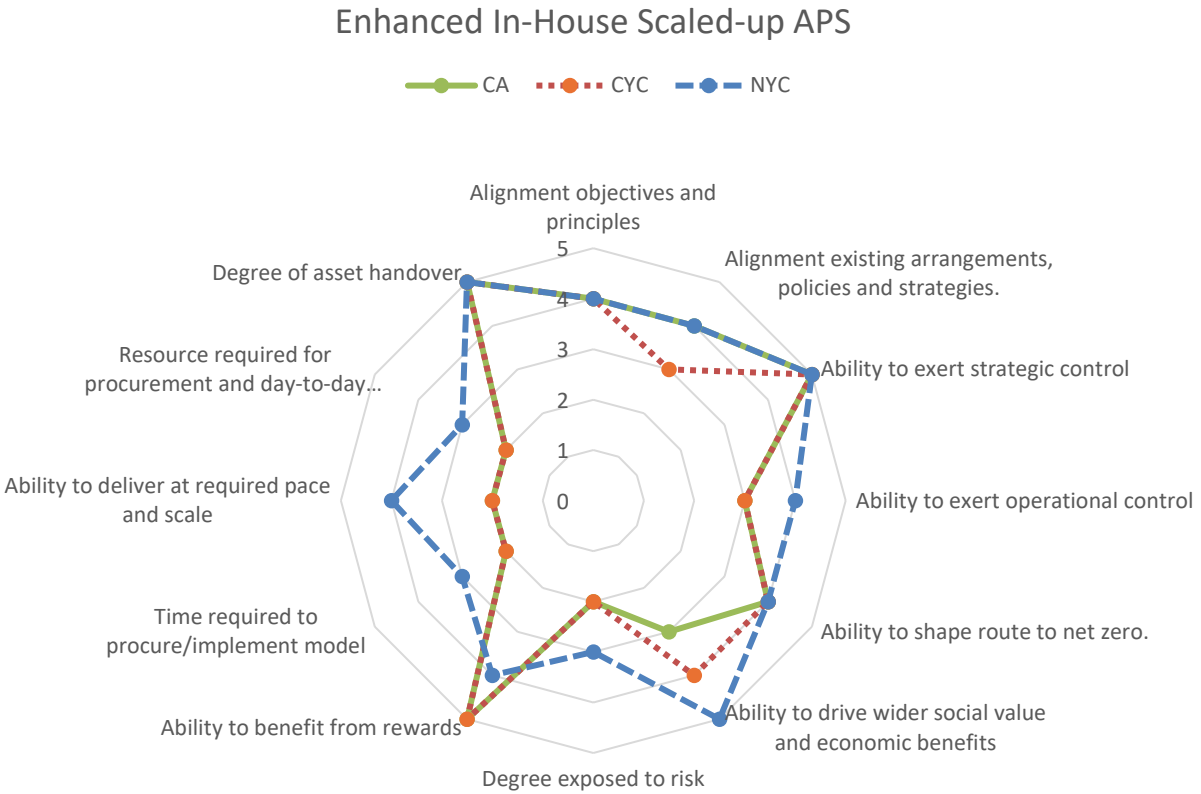
Enhanced In-House Scaled-Up APS

Total (out of 35)	12

Theme	Summary		BAU	Score
Governance	Utilises joint governance board, decisions are made collaboratively based on regional priorities and strategic goals. [Align creates third arm with CA, NYC, CYC shareholder status]		1	3
Capacity & Capabilities (Short & Long Term)	APS increase in demand would increase delivery and natural scale-up. Time taken to undertake governance could be ~1 year. No development capacity added.	APS could scale up longer-term to increase their scope, but development team needed to support this pipeline. Longevity of action would be beneficial for YNY to retain knowledge.	1	2
Project Development	Align have no desire to originate (therefore BAU) but have capacity and expertise to create technical feasibility studies (limited across net zero portfolio). BAU funding for project development (grant funding).		1	2
Funding & Finance	BAU, reliant on public funding, no capacity blend with commercial investment, on project-by-project basis .		1	1
Delivery	Capacity and capability of delivery in Teckal but not on wider net zero portfolio. BAU procurement would exist for large scale renewables, heat networks, EV etc, resulting in slow pace of delivery. Aggregation of assets may lead to more effective delivery through APS.		1	1
Community Benefit	BAU, trusted brand, joint team can enable strategic approach in project development but BAU capacity/capabilities and ad-hoc delivery results in marginal improvement.		1	2
Economic Opportunity	Can build on Align's existing supply chain framework for retrofit investing in local supply chain, apprenticeships, and job creation by scaling up longer-term. Does not reach wider scale of local businesses (especially across net zero portfolio).		1	2
Carbon Reduction	BAU, Align already used by both authorities, pressure on Teckal could even stagnate carbon reduction progress.		1	1

Appendix

Enhanced In-House Scaled Up APS



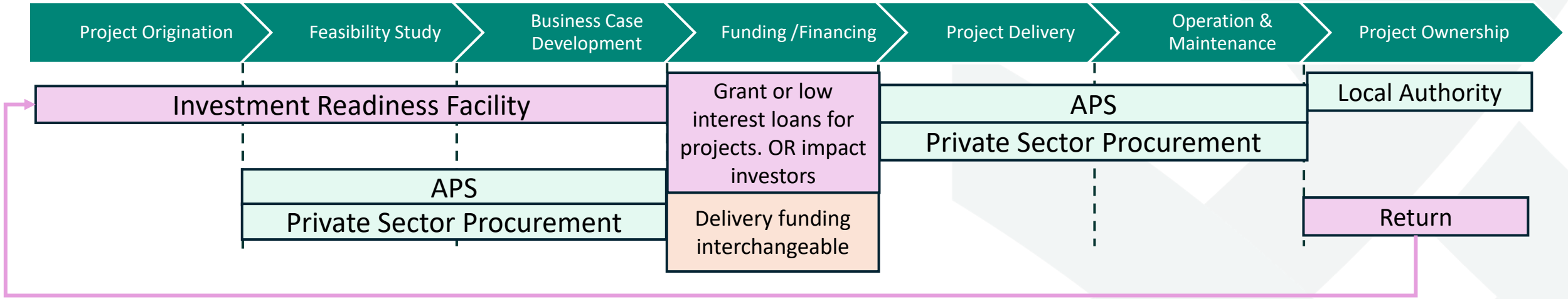
Model	CA	CYC	NYC	Total
Enhanced In-House Scaled-up APS	41	41	48	130

Appendix

Investment Readiness Facility

Key
BAU
Model Specific
Other

A revolving debt facility to help projects reach stage of investment readiness.



Governance	Resource	Project Route
• Joint governance board for strategic oversight, final decisions on facility including criteria of funding allocation. • Could transfer operational control over time to commercial third party.	• Set up of the facility, integration with EGAP to consider (e.g. LINC 50k) • Central programme design and management teams (e.g. Mayoral Investment + LAs). • Funding of the investment readiness facility. ○ Could come from public or private or blend of finance, likely will initially come from Authority. (e.g. LINC 150k over three years).	1. Project origination by YNY authority / other. 2. Project taken to IRF to assess project against facility criteria. 3. If approved, project given grant or more likely low-interest loan for project development. 4. Project taken to investment readiness by individual authority. 5. Project commercial investment and/or delivery procured by individual authority. 6. Agreed revenue returned into IRF, revolving loan facility.

Appendix

Investment Readiness Facility

Total (out of 35)	13

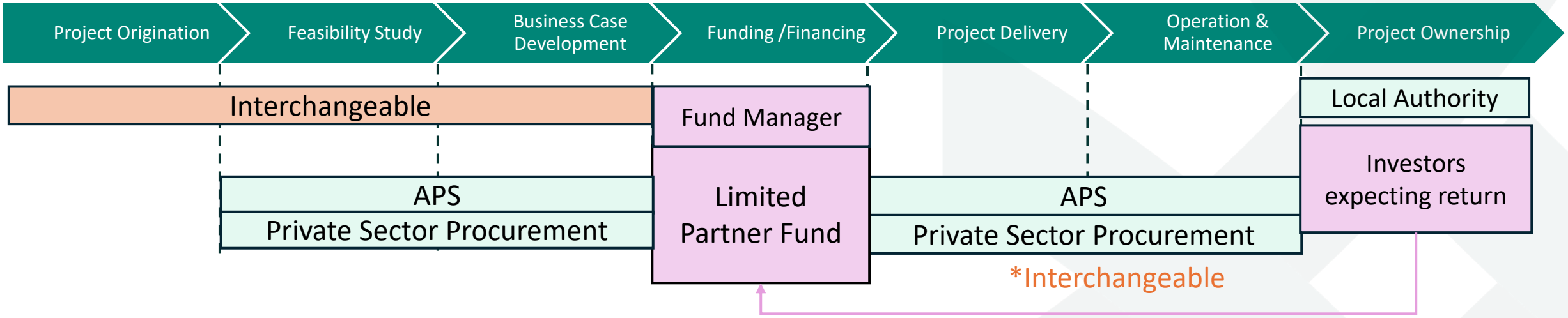
Theme	Summary		BAU	Score
Governance	Revolving function secures longevity of approach. Utilises joint governance board, decisions are made collaboratively based on regional priorities. Decisions potentially still on project-by-project and individual governance policies and routes still apply and could lead to inefficiencies.		1	2
Capacity & Capabilities (Short & Long Term)	Capacity required to set up the framework, will likely take ~1 year. BAU in meantime.	Revolving mechanism that could potentially support itself longer-term as payments come back into the IRF.	1	2
Project Development	Dedicated regional project development fund through committed funding from YNY. In-house team and criteria able to integrate social value. But existing BAU project-by-project procurement for feasibility studies.		1	3
Funding & Finance	Innovative approach that retains project development funding with increased internal capacity. Little consideration of aggregation and bundling for delivery. Project readiness function sets up likelihood of commercial investment but not secure.		1	2
Delivery	BAU delivery function.		1	1
Community Benefit	Joint team can enable strategic approach in project development but BAU capacity/capabilities and ad-hoc delivery would likely result in marginal results.		1	2
Economic Opportunity	BAU, project-by-project procurement gives little opportunity to grow local supply chain.		1	1
Carbon Reduction	Pace and scale marginally quicker than BAU.		1	2

Appendix

Limited Partner Fund

Key
BAU
Model Specific
Other

A collective investment vehicle where investors provide capital and GP manages the fund.



Governance	Resource	Project Route
• Fund manager decides if funding should be allocated based on criteria of the fund set by YNY during formation of the fund.	• Existing climate teams, likely to increase in capacity to meet demand of funding. As well resource to set up the fund (i.e. attracting investors). • Fund manager salary plus bonus based on success of the fund to incentivise. • Significant upfront contribution required by CA to ensure confidence for other investors.	1. Project originated and progressed to FBC by YNY (Interchangeable process). 2. YNY approves funding route to be appropriate for fund. 3. Fund manager assesses project and allocates funding/finance appropriately according to fund criteria if appropriate. 4. Once funding received, YNY engage with private sector to secure delivery method.

Appendix

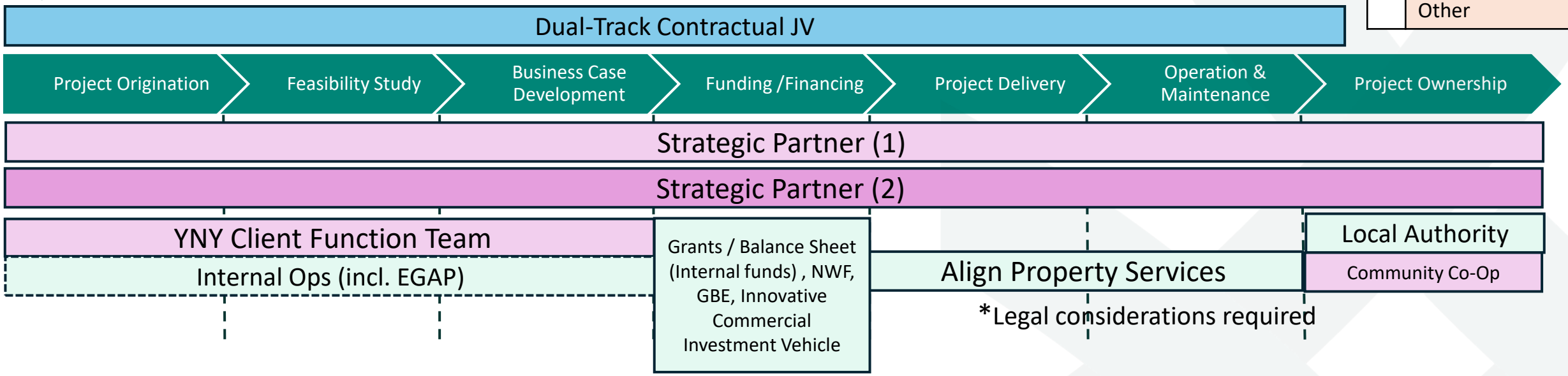
Limited Partner Fund

Total (out of 35)	15

Theme	Summary	BAU	Score
Governance	Fund criteria set by joint YNY (strategic board) but likely lacks pace and scale due to long-lead time to set up fund, funding likely to be release in staggered stages. Fund manager controls allocation of funding (flexible to uncertainty).	1	3
Capacity & Capabilities (Short & Long Term)	Capacity required to set up the framework, will likely take multiple years to achieve. Involvement with fund manager to set up could be advantageous. Reliant on fund manager, provides knowledge and expertise but no upskilling opportunity for YNY employees as would have to be separate.	1	3
Project Development	Likely fund will not provide project development funding. BAU	1	1
Funding & Finance	Capacity and capability of fund manager to blend public (balance sheet) and private investment. Portfolio bundling of projects likely, but dependent on investor-type requirement for commercial return would be priority. Criteria of fund can be set to aid ability to maximise outcomes for YNY.	1	3
Delivery	LP draw down would include project management costs. But overall BAU delivery.	1	2
Community Benefit	No community engagement function (BAU). Committed criteria to community energy projects and social value benefits within fund criteria possible.	1	2
Economic Opportunity	Potential for local businesses to draw down from the fund but overall support for wider supply chain growth is BAU.	1	2
Carbon Reduction	Not reliant on piecemeal funding, staggered consisted funding with carbon reduction in criteria. Pace and scale reliant on project-by-project basis, however.	1	2

Appendix

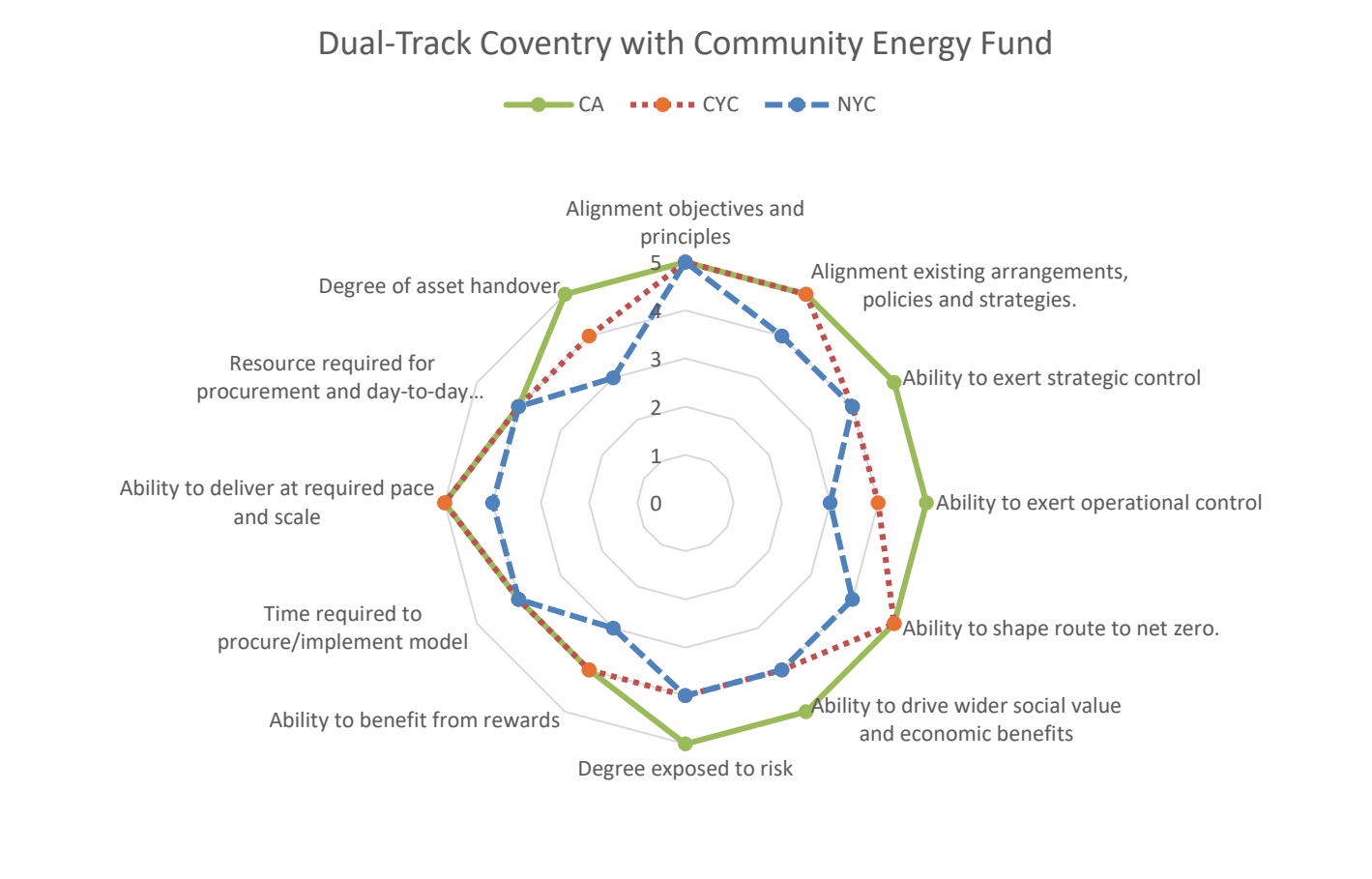
Quick Model Solution



Theme	Justification	Score
Governance	Allows for somewhat increased variation in project factors	3
Capacity & Capabilities	See Strategic Partner-Led Contractual JV	4
Project Development	See Strategic Partner-Led Contractual JV	4
Funding & Finance	See Strategic Partner-Led Contractual JV	3
Delivery	See Strategic Partner-Led Contractual JV	4
Community Benefit	See Strategic Partner-Led Contractual JV	3
Economic Opportunity	See Strategic Partner-Led Contractual JV	3
Carbon Reduction	Increased action at pace and scale	4

Appendix

Dual Track Contractual



Model	CA	CYC	NYC	Total
Dual Track Contractual with CE Fund	57	52	46	155

Appendix
Community Energy & Community Benefit Analysis Summary

Introduction: Definitions and Scope

Key Term	Definition	How will this be incorporated into the Strategic Energy Pilot?
Social Value (SV)	This is the **broad framework** through which the positive impact that an organisation has on **social, economic, and environmental well-being** can be demonstrated.	One of the core themes in the Strategic Framework, Social Value will be measured as a key outcome for final model delivery, through the development of a Social Value Portal to monitor KPIs, including metrics such as job creation, and health outcomes.
Community Benefit (CB)	A **mechanism** through which social value can be achieved, it is the **positive impact that a specific project or programme** has on the social, environmental, and economic landscape of the local area **in direct response to community needs**.	Under the key outcome of Healthy & Thriving Communities, community benefit is a key priority in project delivery. Regardless of final model option, understanding how each project can support a community will be a central consideration.
Community Energy (CE)	An **approach** through which community benefit and social value can be generated, "community energy refers to the delivery of community-led renewable energy, energy demand reduction and energy supply projects, whether **wholly owned and/or controlled by communities** or through a **partnership with commercial or public sector** partners." – *Community Energy England*	Community ownership of an energy project is a common way in which communities can benefit directly from a renewable energy installation, whether the project was initiated directly by the community or not. Therefore, community energy is one of the best ways in which communities can benefit from the delivery of a strategic partnership in Y&NY.
Community Engagement	A strategic approach for **including the community in projects** through **meaningful communication and participation**, to maximise project outcomes for both the community and developer. When conducted effectively, it is a way to **build public trust and buy-in** and ensure that the project is tailored to meet local context and needs.	Delivered through EGAP WP2, to develop a guide for targeted, fair and inclusive community engagement for communities in Y&NY for both LA and commercial led energy projects. Some mechanisms outlined in this section will also support and involve community engagement.

Scope of this Analysis:
This analysis will focus specifically on mechanisms to support the delivery of Community Energy and Community Benefit. The justification for this scope is that Social Value will be incorporated more widely across the project, and methods for Community Energy and Benefit will more directly address the intended outputs of the final model, primarily decarbonisation projects on the public estate. Whilst the methods discussed in this analysis often feature elements for community engagement, strategies for community engagement as defined above will be delivered through EGAP WP2 and incorporated into the delivery model at a later date (through the project development framework created through EGAP).

Introduction: Purpose and Methodology

Purpose of this Section:
With central government's push for Clean Power by 2030 and York and North Yorkshire's own ambition to become Carbon Negative by 2040, there is a significant requirement to decarbonise our energy system at pace and scale. However, rising energy bills have seen increased cases of fuel poverty, with 14.2% of households in North Yorkshire and 13.5% of households in York classified as fuel poor. Coupled with the increasing public distrust of large-scale renewable developments, and the negative attitudes around "net-zero", **there is an imperative to ensure that communities feel the direct benefits of a clean energy transition.** By incorporating clear mechanisms for community benefit, primarily through community energy, we can ensure that the final delivery model maximises social value outcomes, working towards the Y&NY Mayor's Vision for 'Healthy & Thriving Communities' and helping our local communities to prosper.

Methodology: In May 2025, through desk-based research and stakeholder engagement, an initial Community Energy report was developed to inform the LNZA City Leap pilot. The report provided an overview of the CE landscape in Y&NY and discussed the ways in which community energy could be supported through a final model option to maximise community benefit and engagement in project delivery, and address the barriers faced by the community energy sector in Y&NY. The outputs of this report have been developed and will now feature in this section of the options appraisal.
The following section will outline methods for community benefit from energy projects, ranging from low to maximum ambition, and levels of risk, reward, and resource required. The suitability of each model option to deliver each of these mechanisms will then be assessed.

Mechanisms identified:

Arrows indicate a similarity or adaptation of the mechanism

Community Energy:
- Community Energy Fund
- Capacity building support
- Shared ownership
- Community Energy One-Stop-Shop
- Asset leasing & PPAs
- Community Energy CIC

Community Benefit:
- Operational social value generation
- Community Benefit Fund
- Community Shares on projects
- Community Bond issuance
- Community Cooperative
- Direct subsidisation and delivery of household energy projects

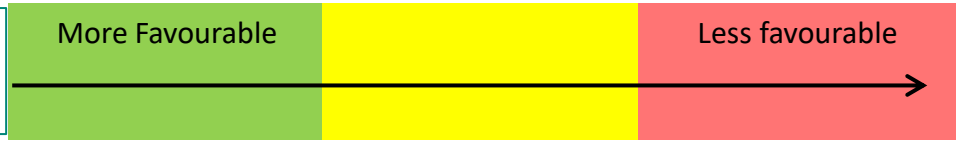
Desk-based research and stakeholder engagement → Community Energy report → Identification of most appropriate mechanisms for CE and CB → Assessment of mechanisms' risk and resource requirements to understand level of ambition → Analysis of suitability for model options in the delivery of outlined mechanisms for CE and CB

Mechanism Overview: Structure of Analysis

Each mechanism will be discussed in relation to the following criteria :

Ambition	Reflecting the overall complexity, commitment, and buy-in that would be required in order to deliver the proposed mechanism. 'High' ambition would be a complex mechanism requiring significant senior leadership and/or private partner buy-in and commitment, whereas 'low' ambition would be considerably more straightforward to implement. The ambition ranking will not be colour coded as the criteria is designed to indicate the overall complexity of the mechanism, rather than favourability.
Risk	Risk is categorised specifically in terms of risk to the Combined and Local Authorities, including financial risk, reputational risk, and risk that the mechanism may 'fail' to achieve what it is intended to deliver.
Reward	Reward is categorised as reward for the community – whether financial, social, or environmental, this is the level of benefit the proposed mechanism has the potential to deliver for residents of Y&NY.
Resource	Resource refers to the level of investment required to develop, implement, and deliver the mechanism over time. Included within 'resource' is capital/funding required, in-house capacity and time commitments, and the use of LA/CA owned assets.

Each mechanism will be ranked from 'low' to 'medium' to 'high' for each criteria, accounting for variability based on how the mechanism is implemented. Each ranking (except for Ambition) is then colour coded based on how favourable this is when deciding which mechanism to implement.



Mechanism Overview:
Community Energy Fund

Mechanism description – 'standard approach':
A programme of funding that provides grant or loan support for community-led energy generation or efficiency projects.

How this mechanism could potentially be delivered:

- A ring-fenced LA-led fund, supported through project profits or through wider public sector funding e.g. GB Energy.
- SEP will dedicate a proportion of profit towards a Community Energy Fund, designed to fund pre-feasibility and project development for new community groups, as well as for organisational capacity building.

For maximum impact, it is proposed this fund covers organisational capacity building i.e. staffing costs, development funding i.e. pre-feasibility, feasibility, and business case, as well as capital and revenue funding. It could also cover group promotional activities and outreach and potentially support financial viability of projects through grant provision.

Strengths: Flexible use of resource, relatively easy to deliver in-house. Can support wide range of projects at pace and be delivered strategically.	**Weaknesses:** Limits to wider community benefit, use of fund limited to energy projects. Projects supported not determined by community.
Opportunities: Scope can be expanded to support capacity building, pre-feasibility etc.	**Threats:** May be more challenging to fund in-house. Limited effectiveness without technical knowledge and support.

Case Study:

Bristol City Leap launched a £1.5m community energy fund for community projects. Financial contributions were made to start the fund by Ameresco and Vattenfall (£750,000 each), as well as ongoing profits from any Bristol City Leap funded energy projects. The fund provides microgrants up to £1,000 and development grants for larger projects up to £50,000, as well as 0% interest, zero obligation loans of up to £50,000. The fund runs every 6-months, with a variety of project types funded: installing low carbon building improvements, energy demand management e.g. smart meter installations, low-carbon transport e.g. EV charging, electricity generation e.g. solar PV installations, heat network connections, and community support in energy consumption e.g. behaviour change initiatives. The Fund also offers project development funding to get projects 'investor ready'. A total of 21 projects have been funded so far.

Ambition	Low

A Community Energy Fund is a relatively low ambition mechanism to support the community energy sector.

Risk	Low

Full control over level of investment, no capital risk or expectation of financial return. Full authority control over fund delivery.

Reward	Med / Variable

Limited without other measures, e.g. capacity building, and dependant on size of fund. If it covers early-stage development and staff costs it will be more effective in supporting CE sector.

Resource	Med / Variable

1 FTE could feasibly deliver. Size and frequency of financial commitment can vary as needed; however, positive impact of the fund will be linked to level of investment.

Mechanism Overview:
Capacity Building Support

Mechanism description – 'standard approach':
A programme of support providing financial, legal, business, and technical advice to help community groups overcome barriers in project delivery, as well as training and skills development for new and developing CE groups. This includes community outreach and engagement to educate and build interest in the benefits of CE and support in the creation of new CE groups and projects. This does not necessarily include direct project funding.

How this mechanism could potentially be delivered:

- A dedicated in-house team providing and coordinating support for community energy groups and projects, working with partner organisations to conduct community outreach.
- An SEP required to dedicate X number of hours of a paid professional's time to provide mentoring and hand holding support services for community energy projects, allowing community energy groups to access the resources and expertise of an experienced, large commercial entity.

This mechanism should ideally be delivered as an enabler to the other suggested mechanisms to support the foundational development of the CE sector. There is also the potential to expand the scope of capacity building support to provide funding for core organisational services e.g. staff.

Strengths: Supports and strengthens community ability to initiate and deliver projects. Coordination of support.	**Weaknesses:** Requires significant resource and in-house upskilling, and long-term/consistent support and engagement.
Opportunities: If delivered correctly, has the potential to significantly expand CE sector and groups.	**Threats:** Potential to duplicate existing support and create confusion on where to access resources.

Case Study: Community Energy Pathways capacity building programme:
Community Energy Pathways offer a capacity building programme that has been commissioned by many local authorities, including Essex, Suffolk, and Kent County Councils. The 2-year programme aims to build up a network of well-established community energy groups in the region. The process involves: Assessment of existing community energy landscape in the region (potential and constraints) and the development of a capacity building implementation plan; Mobilisation and implementation of engagement plan, providing project support and facilitating a regional community energy network; Providing tools and training, including guidance on organisation start-up, project development, business plans, funding applications, site and feasibility studies, and advanced tools such as share offers and PPAs; In-depth capacity building, through embedding mentors in community energy groups, working to build organisational capacity and bring in paid staff, identifying large scale projects, and identifying routes to long-term revenue and incorporation.

Ambition	Medium

Whilst requiring significant resource, the approach can be scaled accordingly, and level of support can be tailored to capacity.

Risk	Low

No great financial or reputational risk but would require long-term commitment and investment to be successful.

Reward	Medium

Would be beneficial in helping the development of new community energy groups, however, would need to be paired with funding to transition towards successful project delivery.

Resource	High / Variable

To be delivered effectively, would require an upskilled in-house team providing advice and engagement across the full Y&NY region.
Less resource would be required with a private partner.

Mechanism Overview:
Shared Ownership

Mechanism description – 'standard approach':
Shared ownership is where a community group is a financial partner in a commercial renewable project for its lifetime. It can help to balance risk and financial and administrative strain whilst still empowering communities in energy ownership. Shared ownership can be delivered in three ways:

1. Split ownership – community owns a physical proportion of the project infrastructure.
2. Joint venture – community owns a stake/shares in a special purpose vehicle for the project.
3. Shared revenue – community purchases a share of future revenue with no control or ownership over project.

How this mechanism could potentially be delivered:

- Delivery of one of the above by either developer or LA-led renewable energy projects.
- Requires early community engagement and co-design to ensure community buy-in.
- Authorities to coordinate developer interactions with communities, potentially offering loans to back community stakes in private partner projects for communities less able to raise upfront capital.
- Contractual commitment for % community ownership from a private partner.

Strengths: Local ownership and benefit with less financial and delivery risk for the community. Mechanism for community benefit and engagement, without the need for a local community energy group.	**Weaknesses:** Communities have less control and choice over type of projects delivered. Can be a challenge for communities to raise funds quickly, so requires long engagement process. Not yet commonplace as an approach.
Opportunities: Building trust between communities and developers. Potential for shared revenue to be delivered through a community benefit fund.	**Threats:** Risk of excluding members of the community who cannot afford to 'invest' in projects or raise funds in time. If not delivered properly can damage community trust.

Case Study: Forest Gate Solar Farm, North Wiltshire
A 49.9MW solar and BESS development with 20% ownership for a community benefit society – Zero North Wiltshire – made up of community groups Zero Chippenham and Bath & West Community Energy. The benefits are estimated at £5 million from 10 MW ownership for the project life, with a separate community benefit fund totalling £800,000 across the 40-year project lifespan. This will go to supporting local initiatives to support carbon reduction and reduce fuel poverty.

Ambition	Medium

Would require clear framework for implementation and strong commitment for delivery.

Risk	Medium

Limited financial risk. Requires careful engagement with community to be effective, risk of reputational damage if delivered poorly.

Reward	High

Ensures that communities can benefit directly from any energy projects delivered in their local area, regardless of whether it is community-led.

Resource	High/Variable

Would require a % of project infrastructure and revenue to be relinquished. Depending on type of ownership may have large administrative and legal requirements for delivery.

Mechanism Overview:
CE One-Stop-Shop

Mechanism description – 'standard approach':
A centralised service aiming to be a single point of coordination for all regional support and services required to develop community energy projects, including technical and financial advice, demonstrators, training, and funding applications. The destination for this service can be online or in-person.

How this mechanism could potentially be delivered:

- A separate, upskilled in-house team dedicated to community energy support and sector and supply chain development.
- A private partner could provide drop-in support and expert advice, funding, training and outreach sessions, supply chain development, and support in project pipeline delivery.

It is proposed that this mechanism acts as a single service for the delivery of capacity building support, funding programmes, and coordination of regional activity.

Strengths: Strategic delivery, increased efficiency and coordination of community energy support. Access to a wider customer base for partnership delivery.	**Weaknesses:** Would require significant resource, including investment in branding and advertising. Challenges of running a public facing service.
Opportunities: Potential to build off the success of ROSSY (Retrofit One Stop Shop for York). Supply chain and project pipeline development. Streamlining of delivery for public sector organisations, administrative and operational efficiencies.	**Threats:** Would require close coordination with existing regional organisations delivering community energy support to prevent duplication. Challenges of progressing CE projects once sector starts growing.

Case Study: Sheffield City Council
Sheffield City Council have converted a chapel in Sheffield city centre into an Energy Hub, in collaboration with around 20 community and energy organisations. The Hub will be open 5 days a week to the public, offering information and support on energy efficiency measures, retrofit grants, renewable technologies, community energy and more. The Hub will also provide in-person advice and examples of retrofit, helping engage communities directly in the benefits of energy efficiency measures.

Ambition	High

Would require significant in-house commitment and resource to deliver effectively.

Risk	Medium

Challenges in translating large resource commitment into tangible outputs, need to ensure long-term viability of scheme.

Reward	High

Convenient and efficient support for communities interested in energy projects or advice. Building community trust through single point of engagement.

Resource	High

Upskilling of an in-house team to deliver advice and outreach full-time. Possible in-person premises potentially across multiple locations in Y&NY. Branding and Comms support. Would require a consistent, long-term source of funding.

Mechanism Overview:
Asset Leasing & PPAs

Mechanism description – 'standard approach':
The leasing of authority-owned assets to community energy organisations for the construction of renewable energy generation projects. The authority would support project financial viability by using the energy generated through a power purchase agreement (PPA) with the community organisation.

How this mechanism could potentially be delivered:

- Y&NY authorities/private partner identifying and advertising land and buildings to transfer ownership or lease to communities, then supporting the local community in the delivery of a renewable energy project. Once constructed, then organise a direct PPA with the community energy group.
- Private partner as intermediary for procurement of energy if sleeving arrangement is required.

Strengths: Decarbonisation of public sector assets and affordable renewable energy for council buildings whilst benefitting the local community.	**Weaknesses:** Would require a community organisation with the organisational and financial capacity to deliver large scale generation projects upfront. Likely cannot be delivered without capacity building measures.
Opportunities: Could help speed up delivery for an in-house model, allowing Y&NY to focus on priority/anchor projects, community groups can help with the decarbonisation of smaller authority-owned buildings	**Threats:** Challenges getting buy-in, as will likely not be the most financially viable use of assets. Possible legal and procurement barriers on the creation of sleeved PPAs, might need to be private wire connection only.

Case Study: Glasgow Community Renewable Energy Framework
Glasgow City Council have developed a framework to support community benefit and upskilling in energy projects. Through the mapping of vacant and derelict land in Glasgow, the Council identified opportunity sites for projects where the land can be transferred to the local community. The community group will be supported in the design and delivery of an energy or heat generation project on the site that will directly benefit the community.

Case Study: Egni Co-op and Newport City Council
The council has issued 21-year leases for the roofs of council-owned buildings to Egni for the installation of solar panels. Egni were responsible for the delivery of the solar PV and therefore own the equipment and are responsible for all operation and maintenance. The Council directly purchases the energy generated through a 20-year PPA with Egni, and this income goes back to local investors in Egni coop, including all local schools.

Case Study: Bristol City Council Cooperation Agreement
Bath and West Community Energy and Bath and North East Somerset Council set up a cooperation agreement in 2010 to work together to identify opportunities and build renewable energy installations on public sector buildings, delivering community owned solar PV on 15 schools and 4 community buildings, as well as 2 ground mounted solar arrays on Council land.

Ambition	High

Would require consensus on asset leasing, challenging to get senior buy-in and to decide which sites to provide for communities.

Risk	High

Delivery risk of delegating construction, maintenance, and operation costs to community energy organisations, as they may struggle with capacity to manage installations. Risk of legal issues in the creation and management of PPAs.

Reward	High

Direct financial benefit for local community energy organisations. Potential for local investors, such as shares for schools, to maximise community benefit from installations.

Resource	High

Would require the leasing or transfer of a proportion of authority-owned assets. Authorities would still need to pay for energy generation in order for communities to benefit. Legal and procurement requirements for PPAs.

Mechanism Overview:
Community Energy CIC

Mechanism description – 'standard approach':
The creation of a social enterprise, such as a Community Interest Company, as a separate legal entity (potentially facilitated through another existing CIC during initial start-up phase), capable of raising new sources of funding and finance e.g. GB Energy CEF, community shares, revenue-based finance, and hybrid finance such as quasi-equity. The organisation would be fully dedicated to the delivery of community energy, e.g. through group buying schemes for residents, and energy efficiency measures. As a CIC the organisation would be completely not-for-profit, with all revenue being invested back into the community.

How this mechanism could potentially be delivered:
Designing and deploying a Community Energy CIC for York and North Yorkshire.

- Can be delivered in-house through a letter of support from authorities, potentially with a small amount of development funding (<£400,000).
- Private partner would donate funding, support, resources, and could act as primary project development and delivery agent.

Strengths: A flexible, scalable model with direct focus on community benefit. Self sufficient and not reliant on public sector or private partner funding. Profits reinvested to benefit the community, with full control over organisation (no shareholders).	**Weaknesses:** May take time to grow as an organisation, as the CIC itself will have large resource and expertise requirements to engage directly with communities to advise and develop projects.
Opportunities: CIC as a go-to vehicle for delivering community energy support, coordinating regional investment and delivery. Function as a delivery mechanism for regional net zero ambition, operating on a household/community level.	**Threats:** Reliant on external market funding and finance. Potential for reputational linkages to Y&NY with limited legal oversight to enforce.

Case Study – Essex County Council
With only £148,579 of Innovate UK pathfinder funding, in collaboration with Power Circle Projects CIC, Essex County Council developed Essex Community Energy CIC (ECE CIC) as a mechanism for accelerating community energy and wider local uptake of renewables (working with households, businesses, and parish and town councils). The CIC is a legally distinct entity, operating independently from the Council, and therefore only required a letter of support from the Council for its formation. ECE CIC are currently delivering a £10m solar programme, preparing to scale up to £100m+ to deliver a target of 100,000 solar installations a year by 2032.

Ambition	High

Would require initial strong appetite and willingness for a 'hands off' approach from senior leadership in order to deliver.

Risk	Low

Bypasses all risk for authorities, with no formal or legal involvement whilst maintaining oversight of processes and reputability of the organisation.

Reward	High

Quick to mobilise. Coordination of community energy investment and support on a regional level, with all profits reinvested back into the community.

Resource	Medium

May require an initial start-up fund (mix of equity and debt). Potential for private partner to provide financial and technical support. Little to no in-house resource requirements beyond initial design and organisation launch.

Mechanism overview:

Addressing Barriers to Community Energy

'Dashed' icons indicate the mechanism has the potential to address a barrier if the scope is expanded beyond a 'standard' approach (as outlined in the previous slides)

According to Community Energy England's 2025 State of the Sector report, between 2023 and 2024:

- Generation capacity in the community energy project pipeline has decreased by over 50%.
- The level of investment raised for pipeline projects has decreased by two-thirds.
- Stalled generation capacity has increased by over 100MW to a total 379MW.
- The number of community energy organisations working in energy generation has decreased by 7%.

The report highlighted the following barriers that need to be addressed:

- Challenges for new and smaller organisations to develop, due to **limited development and capacity building funding** and **programmes to build knowledge and skills**.
- Lack of support in **accessing grid connections**, routes to market and local supply.
- Long-term **security of income when selling electricity,** with no minimum floor price.
- **Access to sites**, including public land and rooftops and leases for renewables.
- Lack of **financial support for community shared ownership** offered by developers.
- Need for more **support from devolved governments** to coordinate CE sector growth.

Mechanisms	Barriers to Community Energy uptake					
	Lack of development + long-term funding	Lack of knowledge and capacity	Poor financial viability post-Feed in Tariff	Limits to promotion + community outreach	Access to sites + grid connections	Lack of clear regional governance + coordination *
Community Energy Fund	✓	⟡	⟡	⟡		⟡
Capacity building support	⟡	✓				⟡
Shared Ownership	⟡	✓	✓	✓	✓	⟡
CE One-Stop-Shop	⟡	✓		✓		✓
Asset Leasing & PPAs		⟡	✓	⟡	✓	⟡
Community Energy CIC	✓	✓		✓	✓	✓

* This barrier should be addressed through the overall Y&NY Strategic Energy Model; however, some mechanisms are more effective than others in facilitating this.

Comparison
Community Energy

How does the model option influence the overall deliverability of proposed mechanisms?

Overall indication of support for deliverability:

High | Medium | Low

Mechanism	In-House	Public-Private Partnership	New Entity
General comments	Would require greater resource commitment from authorities, as well as internal capacity building to deliver. However, would also have greater control over support provided, and could provide consistent, coordinated support over time once capacity is built.	Private partner would have greater resource and expertise to contribute, leaving more capacity in-house to support in delivery of CE mechanisms. However, private partner support may be 'ad hoc' and limited to commitments made in contract negotiations.	Setting up a new entity is a legally complex, resource intensive, time-consuming process, which may limit the financial flexibility and internal capacity to develop CE support. However, once fully functioning, the new entity can provide expertise, control over assets, and some funding.
Community Energy Fund	Constrained by public sector finances/grant funded. Would require in-house delivery.	A mandatory contribution from the private partner can increase the size of the fund. Private partner can support in fund delivery.	New entity requires large financial commitment, may not leave much resource to contribute to a CEF. Profits prioritised for revolving fund or core delivery.
Capacity building support	Would require upskilling and would take significant time and resource to build up internal team.	Access to expertise of professional organisation, including connections with mechanisms for delivery and funding. However, support may be ad hoc based on contractual commitments.	New entity would require large upskilling, once expertise is established capacity building support could be provided through new organisation.
Shared Ownership	In-house team would have greater control over which projects to put forward for shared ownership and more knowledge on needs of community, but would have to take on administrative burden.	Delivery through contractual commitments to % shared ownership. Challenges of private partner conducting community engagement as a commercial entity.	New entity would focus more on large scale energy generation, shared ownership would be a valuable mechanism for community engagement and ensuring buy-in on projects.
CE One-Stop-Shop	Resource intensive, would require dedicated team and funding stream. May draw resource away from scaling up in-house delivery.	Private partner could provide drop-in support and expert advice, funding, training and outreach sessions, supply chain development, and support in project pipeline delivery.	Resource intensive, would require dedicated team and funding stream. May draw resource away from scaling up new entity, which already requires large cornerstone investment.
Asset Leasing & PPAs	Authority would have full control over assets and could lease land and buildings for community energy projects.	Potential conflict with private partners own asset arrangements. Unwillingness for partner to give up first right of refusal on assets to communities.	New entity would need to prioritise commercially viable projects, potential for community groups to pick up less viable with public sector support.
Community Energy CIC	Minimal start-up investment required, legally ring-fenced allowing quick mobilisation, whilst maintaining strategic influence.	Private partner can work directly with CIC as framework of installers. Can provide funding and support as part of social value commitments.	Creation of two new entities may be an administrative and legal burden for authorities. However, once set up the two organisations can work in tandem, with authority oversight on both.

Additional Mechanisms: Community Benefit

* = variable

Operational Social Value generation: *'Business as usual' approach.*
This would focus on the standard enforcement of social value principles on a project-by-project basis, with limited projects exclusively for community benefit, such as:

- Building of local skills and creation of high value jobs.
- Utilising local supply chains in the construction and maintenance of projects.
- Offering training and apprenticeships.
- Ad hoc support of local charities and businesses.
- Monitoring and reporting of social value outcomes.
- Benefits through delivery of retrofit on social housing.

Through a private partner the delivery of these benefits would be contractual/KPIs.

Low Ambition	Low Risk	Med Reward	Low Resource

Community Benefit Fund: *(potential for a CEF as a proportion of this)*
Regular contributions from partnership profits are put into a fund designed to support local projects for community health and wellbeing e.g. from energy efficiency support to local sports clubs. The fund is managed by an independent fund administrator and panel of community representatives, who determine which local projects the fund will support. Level of contributions to a community can be determined by population, distance from installation, and Indices of Multiple Deprivation. Careful management is needed to ensure the fund is distributed fairly and benefits all members of the community equally.

Low Ambition	Low Risk	Med Reward	Med Resource

Community Share Offering: *A form of Shared Ownership.*
The community in the vicinity of a renewable energy project can buy shares in the project, typically through a Community Benefit Society or Cooperative structure, and become a part owner/shareholder of the installation. Benefits for the community involve joint ownership and voting rights, and financial benefits through interest payments/dividends on shares. It is a useful way of financing projects whilst also benefiting the community for the duration of the project. However, this mechanism can potentially exclude lower income residents, it is therefore important to have low share offers, e.g. £1, or allow for share donation.

Med Ambition	Med Risk	High* Reward	High Resource

Community Bond Issuance: *Community investment without ownership.*
A prudential source of borrowing that allows LAs to borrow directly from communities and spend the funds exclusively on a batch of climate and net zero related activities. Bonds are issued through the FCA regulated crowdfunding platform Abundance Investment, where the full investment process is automated through the platform, including framework set-up, marketing, bond issuance, certificates, and interest payments, to relieve the LA of administrative burden. Benefits include: An active community engagement mechanism to get local buy-in through demonstrating delivery and community wealth building. However, it requires significant advertising to ensure local residents buy the bonds, and all communication must be FCA-approved.

Med Ambition	Low Risk	Med* Reward	Low Resource

Community Cooperative: *Community Share offering scaled up to regional level*.
Similar to the Community Energy CIC mechanism in scale, this would involve the creation of a regional cooperative through which communities can own and benefit from a stake in net zero projects. The cooperative organisation could provide regional governance and support for new community energy projects, coordinating regional delivery and organising community share and bond offers to help fund new projects. The scope of this cooperative could be expanded to include a variety of community projects in net zero and does not need to focus exclusively on energy projects. Through this model communities can be empowered in the funding and ownership and receive the benefits of net zero developments in Y&NY.

High Ambition	Med Risk	High Reward	Low* Resource

Direct household subsidisation and delivery: *High resource requirement.*
Either through an in-house or private partner-led team, work directly with households to realise the benefits of regional decarbonisation, this can include:

- Direct discounts on energy bills for residents near a renewable installation.
- Creating private wire connections or microgrids to include local homes.
- Deliver 'quick wins' - subsidised energy audits, retrofit and energy efficiency measures, or solar and battery installations for low-income households.
- Demonstrator and pilot projects – test and deliver innovative decarbonisation schemes in communities e.g. a Net Zero Terraced Streets

High Ambition	Low Risk	High Reward	High Resource

Comparison
Community Benefit

How does the model option influence the overall deliverab proposed mechanisms?

Overall indication of support for deliverability:

High | Medium | Low

Mechanism	In-House	Public-Private Partnership	New Entity
General comments	Full in-house control of project delivery can be used to drive community benefit. However, will add greater strain on resource and capacity.	Private partner has greater resource and capacity to fund community benefit, many of which are already deployed by commercial developers.	Community benefit mechanisms such as shares or bonds could help bolster funding for new entity to deliver new projects, whilst facilitating community engagement and outreach. However, may struggle with capacity during early stages of new entity set-up.
Operational social value generation	Aligns with CA/LA priorities that projects should generate social value, as well as with wider authority work in supporting local supply chains and jobs etc.	Can be generated through contractual obligations and KPIs. Market engagement showed this is how many organisations seek to create social value.	Less priority over non-commercially viable projects, but authority control over project pipeline will help drive social value priorities.
Community Benefit Fund	Questions around whether profits should go towards a CBF or be channelled back into frontline delivery which would provide social support.	A common approach by commercial developers when looking to engage with communities in renewable energy developments.	New entity will be resource intensive in start-up phase, any revenue generated will be directed into revolving fund or core service delivery for authorities.
Community Share offering	Large administrative burden for the authorities, especially if deployed across multiple projects. Potential legal and financial considerations as well.	Private partner would have greater capacity to handle administrative burden. However, may not be the preferred commercial approach.	New entity will require flexible funding and finance options, however, may struggle with administrative and legal burden of community shares whilst still building organisational capacity.
Community Bond Issuance	Designed for use by local authorities to raise flexible capital. Effective mechanism for communication between authorities and communities. Lower administrative burden but would still require some comms investment.	Not a form of finance accessible to a private partner but could issue other forms of bonds to fund projects. Challenges of getting communities to trust commercial developers with their money, would likely have to be run through CA/LA anyway.	Community bonds suggested as a potential source of capital to fund the new entity. Could help build community trust and visibility of new organisation.
Community Cooperative	Could be set up as a distinct organisation with limited legal or financial responsibilities from the authorities.	Private partner can work with and support cooperative activities, including funding and advice as part of social value commitments.	Creation of two new entities may be an administrative and legal burden for authorities. However, once set up the two organisations can work in tandem, with authority oversight on both.
Direct Subsidisation and delivery	Would require significant in-house upskilling and may be more reliant on grant funding or community bonds for delivery.	Utilise economies of scale, e.g. full street retrofit or solar deployment. However, private partner may be more focused on delivery of large-scale, commercially viable projects.	Less priority over non-commercially viable projects, but once new entity has built capacity can be useful vehicle to deliver these interventions.