

# **53 Small Road, Silverdale**

## **Economics assessment of residential development**

**Prepared for East Coast Heights Limited**

**Draft final**

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# 1 Introduction

East Coast Heights Limited (“ECH”) wishes to obtain a resource consent for a small residential development on approximately 0.37ha of the 3.09ha parcel at 53 Small Road, Silverdale (“the Site”), in northern Auckland. Formative Limited has been commissioned to provide an assessment of the potential economics effects of the proposed activity.

## 1.1 Background

The Hibiscus Coast area<sup>1</sup> has experienced rapid population growth, more than doubling in size between 1996 (when the population was 29,000) and 2024 (population of 60,400).<sup>2</sup> The area immediately around the Site (referred to in this report as ‘Silverdale’)<sup>3</sup> has grown even faster, from a 1996 population of 2,700 to nearly 13,300 in 2024, and that strong growth is projected to continue, with Auckland Council’s growth projections indicating growth of around 60% in the next 30 years.<sup>4</sup> As in the past, the growth is expected to be driven by continued migration from other areas of Auckland, and from overseas.

## 1.2 Objective

The objective of this report is to assess the economic effects of the proposed residential activity, including the economic costs arising from a loss of land that will be available to be part of the entertainment cluster, and the benefits arising from enabling additional residential activity in the area.

## 1.3 Report structure

The report is structured as follows:

- ❖ Section 2 provides an overview of the proposed development.
- ❖ Section 3 summarises the intended role of the Silverdale 2 precinct, how it came to have a bespoke Precinct applied, and the range of activities existing in the Precinct now.

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<sup>1</sup> Defined as the following SA2s - Orewa North, Orewa South, Orewa Central, Hatfields Beach, Red Beach West, Red Beach East, Vipond, Stanmore Bay West, Stanmore Bay East, Whangaparāoa Central, Tindalls-Matakatia, Gulf Harbour North, Gulf Harbour South, Army Bay, Millwater North, Millwater South, Dairy Flat North, Kingsway and Silverdale Central and Silverdale South.

<sup>2</sup> Statistics New Zealand (2024) Subnational Population Estimates.

<sup>3</sup> Defined as the following SA2s - Millwater North, Millwater South, Dairy Flat North, Kingsway and Silverdale Central and Silverdale South.

<sup>4</sup> Auckland Growth Scenario 2023, v1.1. Note that AGS spatial areas do not concord exactly with the SA2s used for Statistics NZ’s historic population data, so AGS data used here relates to the closest approximation of AGS MSM areas, being MSM zones 23, 30, 33-35, 37, and 39-42

- ❖ Section 4 assesses the current state of residential land demand and supply in northern Auckland, and the Hibiscus Coast.
- ❖ Section 5 assesses the current state of entertainment and recreation land demand and supply in northern Auckland, and the Hibiscus Coast.
- ❖ Section 6 provides the economic assessment that compares the economic costs and benefits of the proposed development.
- ❖ Section 7 concludes the assessment.

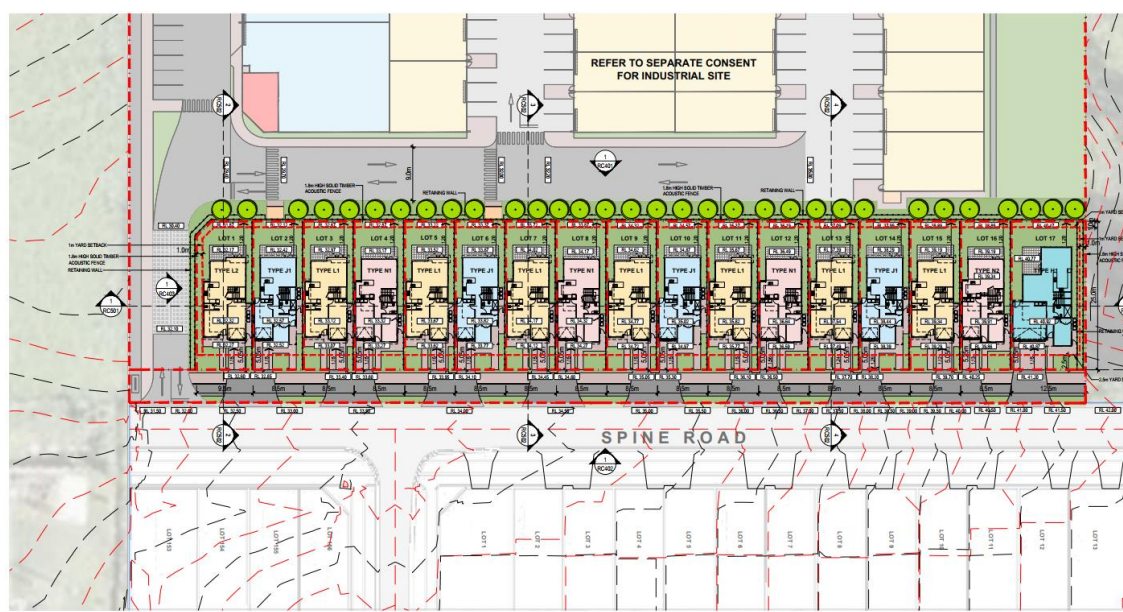
## 2 Proposed development overview

The proposed development is a residential development on the western-most 0.37ha of 53 Small Road, Silverdale, and proposed to be accessed off a new spine road which is yet to be constructed, but which would be an extension of Bronzewater Drive, which runs north-south along the edge of the proposed East Coast Heights residential area.

A resource consent application has been approved for the balance of the Site, for industrial units, and those will be adjacent to the western boundary of the proposed residential development. Other nearby activities include the House of Hope Church and The Botanic Retirement Village to the north, a large proposed residential area to the east,<sup>5</sup> and parcels that are vacant (or mostly vacant, but potentially occupied by single residential dwellings) to the south and west.

The layout of the proposed development is shown in Figure 2.1, and is for 17 residential units on 3,736m<sup>2</sup> of land along the Site's eastern boundary. Those residential lots are proposed to interface with the East Coast Heights residential area to the east, and to be grade-separated from the balance of the 53 Small Road parcel to the west by a retaining wall along the dwellings' western boundary.

**Figure 2.1: Proposed residential development, 53 Small Road**



SITE PLAN Scale 1:250 @ A1, 1:500 @ A3

### SILVERDALE RESIDENTIAL DEVELOPMENT

| LOCATION: SPINE ROAD, SILVERDALE | DATE: 27-09-2023 | JOB: 1469-02 | DWG: RC101

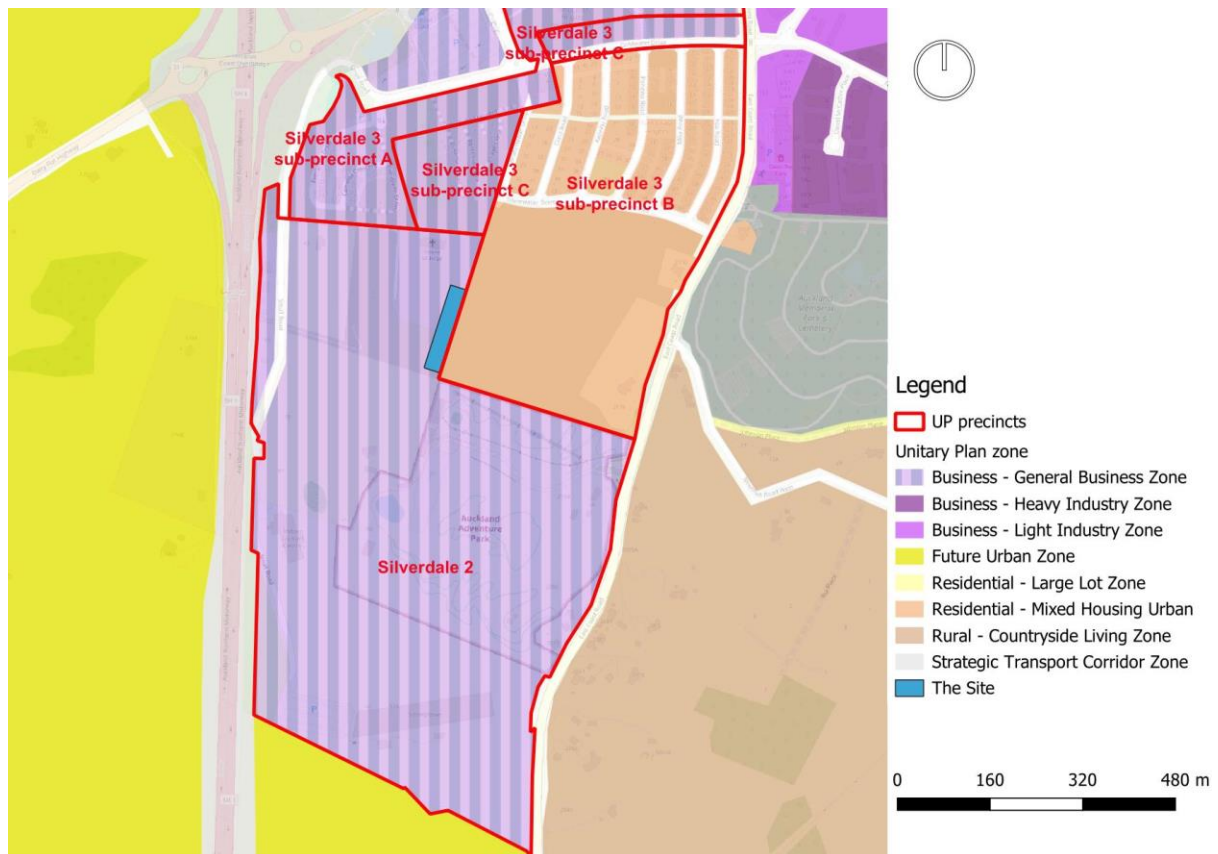
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The Site and surrounding parcels are zoned Business - General Business zone ("BGBZ") in the Auckland Unitary Plan, with precinct overlays (Figure 2.2). The defined sub-precincts restrict the type of

<sup>5</sup> Stages 3 to 5 of the East Coast Heights development

activities that are permitted within them, relative to the BGBZ, as discussed in section 3. The Site is located within the Silverdale 2 precinct.

**Figure 2.2: Unitary Plan zones and precincts**





## 3 Silverdale 2 Precinct

The Site is zoned BGBZ (Silverdale 2 Precinct). In this section we provide an overview of the Silverdale 2 Precinct to provide context for the subsequent assessment about the cost and benefits of the proposed development on the Site.

### 3.1 Purpose of the Precinct

While the BGBZ provides for business activities from light industrial to limited office, large format retail and trade suppliers, the Silverdale 2 Precinct significantly changes the range of activities enabled within that precinct, as described below.

The purpose of the precinct is described in I536 Silverdale 2 Precinct, as follows:

*The purpose of the precinct is to facilitate the development of an entertainment cluster. Activities are limited to entertainment and recreation activities and accessory activities.*

*The development of this area will have a significant impact on the experience of people travelling on State Highway 1 and the Hibiscus Coast Highway. Objectives, policies and standards will assist in creating a vegetated landscape, helping to frame the entrance to the Hibiscus Coast Highway.*

*As many of the buildings used for entertainment and recreation activities involve large utilitarian structures, the provisions aim to ensure that such buildings are designed to achieve a high quality of design and avoid adverse visual effects and mitigation of effects through appropriate landscaping. Activities must not adversely affect the surrounding road network.*

Objectives are to provide for a distinctive recreation and entertainment precinct with a range of recreation and entertainment and accessory activities in a safe, high quality built form and landscape. To achieve that, policies include to limit activities within the precinct to entertainment and recreation (and accessory) activities and restrict other activities. General retail, commercial services and food and beverages activities are not enabled in the Silverdale 2 precinct, which therefore offers limited ability to provide for many of the activities enabled elsewhere in the BGBZ, including large format retail (which is non-complying in the Precinct).

Relevant to this application, residential activities are non-complying, while recreation and entertainment facilities are restricted discretionary, with matters of discretion limited to non-economic matters, such as design, traffic and urban form. The primary activities envisaged in the precinct are defined in the Unitary Plan as follows:

- ❖ Recreation facilities: A facility where the primary purpose is to provide for sport and recreation activities. Includes:
  - ❖ recreation centres;
  - ❖ aquatic facilities, swimming pools, both indoor and outdoor;
  - ❖ fitness centres and gymnasiums; and
  - ❖ indoor sports centres.
- ❖ Entertainment facilities: Facility used for leisure or entertainment. Includes:
  - ❖ nightclubs;
  - ❖ theatres; and
  - ❖ concert venues.

## 3.2 Silverdale 2 provenance

### 3.2.1 Hibiscus Coast Gateway

The Silverdale 2 precinct has its origins in a development proposed in the late 1990s, at which time it was anticipated that the 80ha of land on the south-eastern corner of the Silverdale interchange of the Northern Motorway<sup>6</sup> would become an attractive entranceway to the Hibiscus Coast, and be known as the Hibiscus Coast Gateway (“HCG”). Originally the Silverdale South Structure Plan proposed residential, rural residential and business activity for the HCG, however that was revised in 2003 to try to incorporate the then recently approved non-complying consents for Snowplanet and a go kart track (now the Coastal Cabins site) on Small Road.

### 3.2.2 Entertainment Precinct

In 2007 Rodney District Council commissioned work to assess demand for an entertainment precinct much broader than just Snowplanet and the go kart track. That work (the “PEL report”)<sup>7</sup> recommended that all of the HCG should be a recreation zone, for which it was concluded that there was ample demand, and which the assessment concluded would yield significant economic benefits for Rodney District. Progressing the HCG was complicated when part of the area was identified for a park and ride facility (now operative), but the Hibiscus Coast Gateway Structure Plan was adopted in 2010, and plans for a recreation zone were progressed.

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<sup>6</sup> bordered by the Hibiscus Coast Highway, the motorway, and East Coast Road, and extending as far south as what is now Snowplanet

<sup>7</sup> “Silverdale Entertainment & Recreation Zone Assessment of Market Potential & Land Demand”, June 2007, Adam Thompson of Property Economics

### 3.2.3 Plan Change 123

The vision for the HCG was described in the decision of plan change 123<sup>8</sup> in 2013 as that the HCG would be:

*a recreation and entertainment village type precinct nestled within a woodland landscape, helping to frame the entrance to the Hibiscus Coast Highway.<sup>9</sup>*

The PEL report was referred to in the PC123 decision as recommending that a proposed recreation precinct be established, and that:

*30ha be set aside capital intensive activities (activities such as a cable park (wakeboarding/waterskiing), skateboard park, aquarium, swimming pool complex, shooting range, adventure rides (rollercoaster, etc), rock climbing, surf pool/standing wave, water park and recreation/sport centre) and 60ha for land extensive activities (activities such as a mountain bike track, motorbike track, zorb, luge, four wheel drive park, animal petting zoo, horse riding track and helicopter pad).*

Evidence presented<sup>10</sup> in response to that assessment identified that:

- ❖ Silverdale is sub optimally located within Auckland to be attractive to a large part of the Auckland population, limiting demand for recreation activities within the HCG.
- ❖ The (at that stage, in 2012) recent failure of two recreation and entertainment facilities in the area (a golf driving range and luge track) provided some indication of a lack of demand for such facilities in the area, or a difficult operating environment for those activities.
- ❖ Recreation and entertainment facilities do not need to be clustered together, and few people tend to visit multiple such facilities on a single trip.<sup>11</sup>
- ❖ There is a significant opportunity cost in restricting land use over a large area of strategically valuable land.

The PC123 decision ultimately applied three zones to the HCG area:

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<sup>8</sup> Decision of the Hearings Commissioners for:

Proposed Change 15 - To The Auckland Regional Policy Statement – Extension To The Metropolitan Urban Limits, Hibiscus Coast Gateway; and Proposed Variation 5 - To The Auckland Regional Plan: Air, Land And Water (Operative In Part) – Extension To The Urban Air Quality Management Area, Hibiscus Coast Gateway; and Proposed Plan Change 123 - Special 25 (Hibiscus Coast Gateway Specialist Retail) Zone And Special 26 (Hibiscus Coast Gateway Recreation And Entertainment) Zone.

<sup>9</sup> PC123 decision, page 6

<sup>10</sup> Evidence of Derek Foy to PC123

<sup>11</sup> A position confirmed by Snowplanet's evidence

- ❖ Special 25 (Hibiscus Coast Gateway Specialist Retail) Zone: the area fronting the Hibiscus Coast Highway.
- ❖ Special 26 (Hibiscus Coast Gateway Recreation and Entertainment) Zone: now largely the area of the Silverdale 2 Precinct. The extent of the Special 26 zone was reduced from the original 80-90ha area requested to (largely) the extent of the operative Precinct 2 (c.47ha) because of what the commissioners referred to as an “uncertain demand for recreation and entertainment activities”.<sup>12</sup>
- ❖ An area of Future Urban Zone: this applied to the area north of the current Auckland Adventure Park fronting East Coast Road, and was applied in response to landowner opposition to being included within the recreation precinct, and in recognition of the “uncertain demand” accepted by the Panel.

The Special 25 and 26 zones were recognised to be new zones not previously existing under the District Plan in Rodney or elsewhere within the Auckland Region. Subsequently the Special 26 zone became the Silverdale 2 Precinct at the time of the Unitary Plan hearings in 2016.

### 3.3 Precinct activities

As described above, the genesis of the Silverdale 2 Precinct lies in the establishment of Snowplanet and a former (adjacent) go kart track which were both established as non-complying activities by way of resource consents which were received in 2003. In this section we summarise the activities currently operating in the Silverdale 2 Precinct.

Snowplanet (which opened in 2005) remains on its 14.4ha site, although continues to occupy only around 3.5ha of that site, with the balance being vacant land. In the last five years Snowplanet has been joined by an indoor entertainment area (c.1,000m<sup>2</sup>, with laser tag and arcade games) and preschool on land adjacent to its carpark, but the current 3.5ha occupied footprint has not changed materially since the main activity was established, and around 11ha of the Snowplanet site is not occupied.

The adjacent go kart track closed prior to 2014, and is now occupied by a prefabricated building manufacturer (Coastal Cabins), although that activity appears to use only around 1ha of the 4.7ha site. The only other recreation or entertainment facility in the precinct now is the Auckland Adventure Park, which is immediately north of the Snowplanet site, and is currently open only 32 hours a week during school terms (Figure 3.1). Entertainment activities were first established on the Adventure Park site sometime between 2005 and 2009, although have moved through several configurations since then.

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<sup>12</sup> PC123 decision, page 9. Note that Derek Foy (co-author of this assessment) was engaged for submitters opposing the extent of the proposed Special 26 zone on the grounds that the initially proposed extent was too large, was not supported by a robust evidence base, and that there was insufficient demand to justify 80ha of recreation zone at Silverdale.

Originally a luge track was constructed on the southern half of the site, but that subsequently fell into disrepair when the original business closed, and a new business opened a number of years later on the northern half of the site around 2015. The former 15ha site is now in two titles, with the Adventure Park occupying the northern parcel (6ha), and the southern parcel (9ha). Currently only around 6ha of the northern part of the 15ha site largely vacant, with the original luge track overgrown and not in use.

**Figure 3.1: Silverdale 2 Precinct activities**



Together then we estimate that around 9.4ha of land in the Silverdale 2 precinct (20%) is actively used for entertainment or recreation activities, spread across the Snowplanet and Adventure Park sites, with most of those sites being unused. All other sites in the precinct are not used by entertainment or recreation activities, and are either used by other (non-recreation/entertainment) activities (2.6ha, 5% of the precinct) or appear to be<sup>13</sup> not actively used at all (35.1ha, 75% of the precinct).

<sup>13</sup> We note that active use and vacancy can be difficult to establish with confidence, and that there are two parcels (one of 2.01ha immediately west of the Site, and one of 5.19ha immediately south of the Site) which we have classified as unused, but which may be used for some type of non-recreation activity. CoreLogic classify those sites (respectively) as Vacant Industrial and Vacant Commercial, and each have only a single dwelling-sized building on them.



Of the 35.1ha of the Silverdale 2 Precinct that is not actively used, large parts are on the Snowplanet (10.9ha) and Adventure Park (9.1ha) sites, with most (3.7ha of the 4.7ha) of the Coastal Cabins site appearing to be unused (Figure 3.2) 53 Small Road is also unused, although the larger part of the parcel is consented for industrial units.

Of the parcels that are used (apart from Snowplanet and the Adventure Park), most activities are industrial or commercial in nature, including a doggy day care, Touchwood Homes and Coastal Cabins (both relocatable building manufacturers), and an RV sales yard. A church has recently established in a new, purpose-built building on the 1.7ha parcel north of the Site.

**Figure 3.2: Silverdale 2 Precinct activities**

Current activity	Activity type	Site area (ha)	Used for all purposes		Used for recreation	
			Share actively used (est.)	Area actively used (est.)	Share actively used (est.)	Area actively used (est.)
Vacant (the Site)	Vacant	3.09	0%	-	0%	-
Doggy day care, Touchwood Homes	Industrial/commercial	0.54	100%	0.54	0%	-
Vacant	Vacant	0.13	0%	-	0%	-
RV sales	Industrial/commercial	0.38	100%	0.38	0%	-
Former dwelling	Vacant	2.01	0%	-	0%	-
House of Hope Church	Church	1.74	40%	0.69	0%	-
Snowplanet	Recreation	14.38	24%	3.45	100%	3.45
Vacant	Vacant	5.19	0%	-	0%	-
Auckland Adventure Park	Recreation	14.98	40%	5.92	100%	5.92
Coastal Cabins/Evoke Homes	Industrial/commercial	4.68	22%	1.03	0%	-
Total all activities		47.12		12.01		9.37

### 3.4 Future of the Silverdale 2 Precinct

The assessment on which the viability of a recreation and entertainment zone at Silverdale was based concluded that there was demand for at least 80ha of land for recreation and entertainment activities in the HCG at Silverdale. However, 18 years after that 2007 assessment, only 9.4ha of recreation and entertainment activities are operating, and it appears that demand for such activities in the Silverdale 2 Precinct is significantly less than was envisaged by that report. Currently occupied space is also less than a quarter of the supply ultimately provided for in even the reduced scale of recreation precinct ultimately applied by the decision makers of PC123 a decade ago.

An important question to consider when evaluating the economic merits of the current application is: for how long should the large area of vacant land in the Silverdale 2 Precinct be left vacant in the expectation that recreation and entertainment activities will one day choose to establish there, when then has been no indication that they will. Leaving a large area of land vacant when there are appropriate, productive uses that could be occupying it is inefficient, and represents a significant opportunity cost.

## 4 Residential land demand and supply

The proposed development is for residential activity. To assess the merits of the application from an economic perspective it is necessary to understand demand for and supply of residential land in north Auckland and Silverdale, and this section provides an assessment of that demand and supply.

### 4.1 Residential land demand

The Hibiscus Coast has experienced significant growth in recent years, including in and around Silverdale, which has emerged as the main retail and commercial area servicing Silverdale, Ōrewa, Dairy Flat, and the Whangaparāoa Peninsula. Recent development has been facilitated by the area's good accessibility to the rest of Auckland, with transport links via State Highway 1 and the Northern Express bus station, allowing the area to become a commuter suburb for people working in North Shore City and central Auckland.

The Hibiscus Coast's population has grown from 27,300 residents in 1996 to over 60,400 in 2024. That strong growth is projected to continue, and Auckland Council is planning to accommodate a large amount of new residential and business activity in the Future Urban Zone west of State Highway 1. That development is planned to occur progressively over the next three decades, with the Auckland Future Development Strategy ("FDS") identifying that Silverdale West is expected to be development-ready in the 2030s, and Dairy Flat, Wainui East and Upper Orewa from 2050.

Recent strong growth is ongoing, and Auckland Council's 2020 household projections of growth of 120 households per annum until 2030<sup>14</sup> have been exceeded consistently, and new dwelling consents issued have averaged just over 500 a year for the last five years (2020-2024), or more than four times the growth rate projected in Council's (old) I11 projections. Council's most recent projections for the Hibiscus Coast are for growth of 8,200 households (averaging 275 per year) in the period 2022-2052, confirming that recent strong growth rates in the Silverdale area will continue for the foreseeable future, or until residential supply runs out.

### 4.2 Residential land supply

There has been a large amount of new residential land developed recently to accommodate that growth, including east of the motorway in Millwater and East Coast Heights, and west of the motorway in Milldale. Ongoing residential supply is likely to be provided west of the motorway as planned new growth areas (currently zoned Future Urban Zone) become live-zoned, although the timing of that is not yet known, and much is not expected to be well into the 2030s, given direction in the FDS. So while

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<sup>14</sup> Auckland Council (2020) I11 Projections.

there is a large amount of potential future residential land supply in the area, there is a relatively small, and decreasing amount of live-zoned residential land available to the market.

### **4.3 Demand-supply balance**

The small residential yield (17 dwellings) of the proposed development means that it will make little material change to the overall dwelling demand-supply balance in the Silverdale area. Nevertheless, some additional residential supply in a logical location adjacent to a large existing residential zone, and in close proximity to transport infrastructure, commercial businesses and employment opportunities would in our opinion represent a positive contribution to the area's residential land supply and future housing enablement.

## 5 Entertainment and recreation land demand and supply

As discussed in section 3.3 there has been very little take up of land in the Silverdale 2 Precinct for recreation activities. In fact, the recreation/entertainment activities present there now pre-date the establishment of the Precinct under the Unitary Plan, so the application of the Precinct has not induced any new recreation or entertainment activities to establish in the Precinct (apart from small developments such as Megazone next to the Snowplanet carpark and minor changes to the Adventure Park). Despite the idea of the entertainment zone being considered in 2007 by Rodney District Council, the most significant new recreation facility in the area since then (the Northern Arena in the Silverdale town centre) was established outside of the zone (in about 2011, before PC123 applied the recreation-focussed zoning).

The lack of development of any recreation or entertainment activities in the Silverdale 2 Precinct in the last decade indicates a lack of demand for space in the Precinct to be occupied by those activities. Demand for recreation and entertainment activities is difficult to establish with accuracy, and some such facilities will have sub-regional catchments, and for example, Snowplanet, as the only enclosed ski-slope in the Southern Hemisphere, is understood to attract visitors from across Auckland. Nevertheless, despite being touted as a potential regional attraction, the Precinct has not developed as such, and remains modest in scale.

That is not to say that the Hibiscus Coast is undersupplied with recreation and entertainment activities. Compared to other Auckland local board areas, Hibiscus Coast is well supplied with those activities. From Statistics NZ business demography data, the Hibiscus Coast local board area (“HBLBA”) supports a higher proportion of employment in the sport and recreation sector than all other local board areas except Orakei, and a proportion of recreation and entertainment businesses similar to the regional average. Snowplanet is a large part of the reason for the high proportion of recreation employment in the HBLBA, however because recreation businesses in the HBLBA are comparable to the regional average indicates there is no undersupply of these businesses in the HBLBA.

A plentiful supply of both Council- and non-Council owned recreation facilities in the area is noted in the HBLBA plan,<sup>15</sup> and there is no indication that the area is suffering from any undersupply of entertainment or recreation activities.

In and around the Site, Snowplanet has been operating next door for 20 years. Over this time period, and particularly recently, it has developed high level plans to expand operations on the vacant 14ha

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<sup>15</sup> Hibiscus and Bays Draft Local Board Plan 2023

of its current site<sup>16</sup>, however none of these plans are yet to materialise, suggesting the business case and commercial viability of adding more recreation facilities to their current area, let alone expanding it or co-locating with other operators, has been challenging.

There is no foreseeable reason as to why this would change, but even if it did, and some new recreation or entertainment facilities were to seek to establish in the area, there would be no shortage of Silverdale 2 Precinct land available to accommodate those potential activities, even within the Snowplanet and Adventure Park sites. As discussed in section 6.2.1, there are also many other locations and zones where recreation activities are permitted activities, and so there are alternative locations for activities wishing to establish on the Hibiscus Coast. This suggests that the opportunity cost associated with development of the Site is related to not developing it for residential (or some other non-recreation) activity, rather than there being any risk that approving a residential development would compromise the ability of the Precinct to function as envisaged.

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<sup>16</sup><https://www.nzherald.co.nz/property/snowplanet-seeks-on-piste-associates/SLVAL6ZLZFPW76N74SPMOD5XE/>



## 6 Economic costs and benefits

### 6.1 Economic benefits

Economic activity associated with the proposed residential activity will be stimulated in each of the development phases, with different levels of activity supported during consenting, land development, building construction, and then by businesses occupying the development once it is completed through their role as employers and purchasers and consumers of products and services. Those effects are assessed below, using output from a proprietary subnational economic model, the Economic Linkages Model (“ELM”), as discussed in Appendix 1.<sup>17</sup>

#### 6.1.1 Approach

The first step in the estimation of the economic effects was to estimate the direct expenditure that will occur in each phase of the development, as follows:

- ❖ Consenting and land development: These effects were estimated based on industry knowledge from similar developments, adapting them to the scale and locational characteristics of the proposed development. ECH has also provided information about the budgeted costs associated with this economic activity.
- ❖ Build development: The building design concepts have been combined with build cost data, and construction costings from ECH to estimate the likely construction expenditure that could occur during the build development phase.
- ❖ Resident demands: We have detailed retail expenditure data which has been developed into a retail demand model. This model provides an estimate of the quantum of demand from the new households that would live in the dwellings after the development is completed.

Direct expenditure estimates were then run through the ELM to calculate all flow-on effects associated with the development, including:

- ❖ Direct impacts: The initial changes in the economy due to an economic shock (often new expenditure). The direct GDP effect is calculated based on the value of the shock and the direct employment effect is the number of jobs created by the shock itself.
- ❖ Indirect impacts: These arise as the firms that initially change their output as a result of an economic shock (i.e. the direct effects), purchase required inputs from their supply

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<sup>17</sup> Formative (2021) Economic Linkages Model.

chain. These business-to-business transaction changes are known as the indirect impacts.

- ❖ Induced impacts: These flow from the direct and indirect impacts which generate wages, salaries, and profits for the households. The changed household incomes will generate more spending on goods and services. This household-to-business interaction is called induced activity.

### 6.1.2 One-off economic impacts

The impacts associated with the proposed development were estimated as described above, and are summarised in Figure 6.1. Employment is reported as a Total Employment Count<sup>18</sup>. The key findings of that assessment are that:

- ❖ The consenting phase is estimated to cost \$0.3 million, directly generating 1 employment year. This includes the developer's internal management time, expert research, design and planning costs. This phase will support a further \$0.2 million of indirect and induced value added and 1 additional indirect employment year as direct spend flows through the economy.
- ❖ The land development phase is estimated to cost \$2.0 million in total, directly generating 10 employment years. Those direct costs will support \$1.5 million of direct plus indirect value added and a further 7 indirect employment years as direct spend flows through the economy.
- ❖ The building development phase is estimated to cost \$8.8 million in total, directly generating 29 employment years. Those direct costs will support \$6.9 million of direct plus indirect value added and 49 indirect employment years as direct spend flows through the economy.
- ❖ In total, the direct impacts associated with the proposed development are estimated to be \$11.1 million in total, and generate 40 employment years. Those direct costs will support \$8.8 million of direct plus indirect value added and 58 indirect employment years as direct spend flows through the economy.

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<sup>18</sup> Total Employment Count represents the total jobs generated by the activity, which includes both full- and part-time jobs, and so will be slightly higher than the Full Time Equivalent (FTE) figure.

**Figure 6.1: One-off economic impacts of development (\$m)**

	Direct	Indirect	Induced	Total
Direct Expenditure (\$m)				
Consenting	\$ 0.3			\$ 0.3
Land Development	\$ 2.0			\$ 2.0
Build Development	\$ 8.8			\$ 8.8
<b>Total</b>	<b>\$ 11.1</b>			<b>\$ 11.1</b>
Value added (GDP, \$m)				
Consenting	\$ 0.2	\$ 0.1	\$ 0.2	\$ 0.4
Land Development	\$ 0.7	\$ 0.8	\$ 0.8	\$ 2.3
Build Development	\$ 2.1	\$ 4.9	\$ 3.5	\$ 10.4
<b>Total</b>	<b>\$ 3.0</b>	<b>\$ 5.8</b>	<b>\$ 4.4</b>	<b>\$ 13.2</b>
Employment (TEC)				
Consenting	1	1	1	4
Land Development	10	7	7	24
Build Development	29	49	30	109
<b>Total</b>	<b>40</b>	<b>58</b>	<b>38</b>	<b>136</b>

Additional economic activity will be induced as households earn wages, salaries, and profits from the direct and indirect activity, and those increased earnings flow back into the economy as households spend more on goods and services. Total induced effects are estimated to be \$4.4m in value added, supporting 38 employment years.

Most of the economic effects will be directed to the Auckland economy, as the location of the development and the country's largest economy. Over half of the jobs associated with the proposed development are related to the construction sectors (residential building, heavy construction and services), around 30% would be in sectors that support development (government, utilities, professional, financial, and manufacturing), and around 20% would be in sectors that mostly accommodate the induced activity (retail, services, community and other).

This assessment shows that the proposed development would produce positive one-off benefits for the local community through the generation of employment and other economic benefits arising from costs incurred in constructing the development.

### 6.1.3 On-going economic effects

As described in section 2 the proposed development is for 17 residential dwellings, the occupants of which will generate ongoing economic effects in the local and regional economies. To estimate the magnitude of that spending we have applied our proprietary Retail Expenditure Model and assumed that the new households will have similar spend characteristics to the residents of nearby parts of Silverdale. That assessment indicates that the 17 dwellings proposed would support \$0.22-\$0.27m of

spend in the economy on retail goods every year, and further spending on other categories such as services, education, travel and medical.

If the Site was not developed for residential activity as proposed, and were to be used instead for part of a recreation or entertainment activity, that alternate activity would potentially employ a small workforce to run it. As discussed above, the apparently low demand for recreation activities in the precinct makes it difficult to assess what type of entertainment or recreation activity might establish on the Site (if any) and therefore it is difficult to know what amount of employment any such activity might provide. However, from an assessment of employment levels and densities at Snowplanet and the Adventure Park it is likely that the employment able to be supported on the Site would be very small.

Statistics NZ's Business Directory 2023 recorded only 29 workers employed at the Adventure Park<sup>19</sup> (on 5.9ha) and 35 at Snowplanet<sup>20</sup> (on 3.5ha), a total of around 64 workers on 9.4ha (7 workers/ha). If the Site accommodated 7 workers/ha on its 0.37ha, it would have a workforce of around 3 workers. We acknowledge that employment densities in entertainment and recreation activities are highly variable, so alternate employment on the Site could be either much more or less than 3 workers, but nevertheless this indicates that employment supported on the Site would be very modest in the context of the 28,000 people employed in the Hibiscus and Bays Local Board area, in over 13,000 businesses.<sup>21</sup> That means that the Site's use for residential dwellings would be very unlikely to contribute to any material change in local employment opportunities, even if recreation or entertainment activities were to seek to establish on the Site at some future time.

#### 6.1.4 Wider economic benefits

Other economic benefits (in addition to the direct economic and employment outcomes) will be generated by the location of the proposed development adjacent to existing urban areas, and in a location that is able to be serviced by existing infrastructure, without requiring the construction of new infrastructure as would be the case for greenfields developments. Households that live within the area will have good links to road and public transport networks and access to goods and services in the local area. These aspects of the development can be expected to generate benefits for the local community and the wider economy, and are explained below. These benefits are important to consider when evaluating the merits of the proposal.

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<sup>19</sup> Actually in the "Amusement parks and centres operation" ANZSIC class, assumed to be the Adventure Park for this assessment, given the absence of any other comparable activities in this location

<sup>20</sup> Actually in the "Sports and physical recreation venues, grounds and facilities operation" ANZSIC class, assumed to be Snowplanet for this assessment, given the absence of any other comparable activities in this location

<sup>21</sup> Statistics NZ Business Directory 2022

## **Infrastructure**

There will be some economic benefits from the fact that the Site is adjacent to an existing established urban development containing both residential and commercial activities. This location means that it is probable that infrastructure costs will be lower than other comparable developments, which would result in superior economic outcomes relative to accommodating residential growth in less accessible areas that are not as well served by existing infrastructure.

## **Transport**

The proposed development is only 500m from the Hibiscus Coast Station and Park and Ride facility, and there is a wide range of services and retail already provided in the local area. The Site is also less than 1km from the operative Silverdale industrial zone at Forge Road, which means that households in the proposed development should be able to travel efficiently and access their needs locally which may contribute to mitigating transport costs and emissions, relative to greenfields locations in less accessible areas.

## **Well-functioning urban environment**

We consider that the proposed development would contribute to a well-functioning urban environment by virtue of its proximity to existing infrastructure and retail, commercial and industrial businesses.

## **6.2 Economic costs**

There would be some economic costs of the proposed residential use of the Site. One cost is that residential use would preclude use of the Site for activities enabled under the operative BGBZ Silverdale 2 Precinct zoning. To assist evaluation of the application, this report assesses the implications of that change in land use from that enabled in the Unitary Plan, drawing on the assessment in section 5 (Entertainment and recreation land demand and supply).

### **6.2.1 Effects of reducing BGBZ supply**

Using the Site for residential activity rather than recreation/entertainment uses may have some potential economic costs.

The Site is 0.37ha, and represents about 1% of the total vacant land area (35.1ha, from Figure 3.2) in the Silverdale 2 Precinct. Use of that 0.37ha for non-recreation/entertainment activities would therefore remove 0.1% of the existing vacant land from being available for future occupation by any non-industrial activities, or about 1% if considered in conjunction with the balance of the parcel at 53 Small Road (subject to an approved consent for industrial activities). That is not a significant decrease in vacant land in the context that only 9.3ha (again from Figure 3.2) of the Precinct's total land area is



currently being actively used for recreation and entertainment activities, and it has been 20 years since Snowplanet opened and began what was intended to become a significant entertainment cluster.

Further, while the Silverdale 2 Precinct provides for those recreation and entertainment uses as its primary purpose, those uses are not without alternative location options:

- ❖ Recreation facilities: are permitted in Metropolitan, Town and Local centres, the Business - Mixed Use, Business – General Business, and Business – Business Park zones, and are not permitted in only the Neighbourhood centre and Light Industry zones (Discretionary) and Heavy Industry zone (non-complying).
- ❖ Entertainment activities: are permitted in Metropolitan and Town centres, the Business - Mixed Use, Business – General Business, and Business – Business Park zones. They are not permitted in only the Local and Neighbourhood centre and Light Industry zones (Discretionary) and Heavy Industry and Business Park zones zone (non-complying).

This broad range of location options is perhaps one reason why the Silverdale 2 Precinct has not developed into the entertainment and recreation hub it was aspired to be when the HCG was being imagined, and when PC123 was approved a decade ago. Because there are so many location options for those activities, the Silverdale 2 Precinct has been much less attractive to its intended primary activities than was envisaged.

In that context, a loss of 1% of remaining vacant land would be a less than minor loss of land that would not adversely affect the potential for future entertainment and recreation activities to establish in the vicinity of Snowplanet and the Adventure Park in the future, given the very large area (32ha) of vacant land that would remain in the Precinct.

### 6.2.2 Infrastructure costs

Another potential cost of the development is the cost of servicing it with infrastructure, and the possibility that the servicing costs would need to be borne by ratepayers. However, we understand that the area is already well serviced with waters, roading and other infrastructure, and no infrastructure upgrades will be required. That is, the infrastructure requirements of the proposed activity are no greater than those of permitted activities on the Site, and perhaps even much less, given some of the recreation activities (such as wakeboarding/waterskiing, aquarium, swimming pool, surf pool) that it was envisaged in PC123 might establish in the Precinct (as discussed in section 3.2.3).

### 6.2.3 Residential activity

The Site is a small part of the parcel of land at 53 Small Road, and we understand that the Site would be grade-separated from the balance of the parcel by a retaining wall about 3m high. That would

enable efficient use of the part of the parcel that borders the residential area adjacent to the Site's east, and provide some separation between the dwellings proposed and any alternative use on the balance of the parcel. The interface then would be between the Site's residential activity and the neighbouring East Coast Heights residential development.

For these reasons the use of a small part of the Site for residential (and not recreation) activities represents a small opportunity cost in terms of not accommodating employment on that area, however we understand that achieving employment activities on that small area would be difficult due to the topography, and so in net terms the dwellings proposed represent an efficient use of that part of the Site and other than the opportunity cost of preventing employment activities on that small part of the Site, there are no adverse economic effects of permitting the development of the dwellings as proposed.

## 7 Conclusion

The development of the Site would produce positive benefits for the local community through increasing local dwelling supply. Benefits would arise during the construction phase, with employment and increased spending in the economy arising out of the planning and construction of the development, even accounting for the possibility that some of that construction activity would still likely occur on other developments, should the proposed development not proceed. Benefits would also endure in the post-construction phase, when residents of the development will support additional activity in local businesses, including retail and commercial activities. The magnitude of these positive effects will be very small, due to the small size of the development proposed, but they would be positive effects.

As was suggested at the time of the PC123 hearings a decade ago, the concept of a very large entertainment and recreation precinct in and around the Site was not well supported by evidence justifying its viability, demand for it, or in fact even the concept of a cluster of those activities. The passing of the last decade has confirmed that the 47ha zoned for such activities was excessive, relative to the demand for and viability of those activities. The proposal represents a pragmatic response to making efficient use of land that has remained undeveloped for a decade since it was zoned, and for which there appears to be little or no demand to develop for recreation and entertainment activities, which are the primary activities enabled within the bespoke Silverdale 2 Precinct.

# Appendix 1      Economic-Linkages-Model

The Economic Linkages Model (“ELM”) is a proprietary model that has been developed to quantify and measure the economic activity and relationships within the New Zealand economy. In summary, the ELM measures the flows of money and goods through the economy, at a sector and sub-national level.

The model records the interactions and relationships between actors in the economy, including businesses, households, government, exporters, and importers. At its essence, the interactions in the model describe how each industry responds to changes in the economy, which ripples out to influence a range of other outcomes (e.g. household decisions).

The ELM measures the economy using a range of standard economic metrics, which includes gross output<sup>22</sup>, GDP<sup>23</sup>, value-added, employment<sup>24</sup>, incomes<sup>25</sup>, consumption<sup>26</sup>, tax<sup>27</sup>, and trade. The model uses a subnational Input-Output Table that has been regionalised by Formative. This appendix outlines the nature of the Input-Output table, the underlying assumptions within the ELM and the key modelling steps.

## A1.1 Input-Output Table

The Subnational Input-Output Table (“SIOT”) has been developed by Formative to provide detail on the economic linkages between sectors and geographies within New Zealand. The table has been defined to include 65 economic sectors and 39 geographies.

The 65 “sectors” have been defined using standard industry classification (ANZSIC06), with each sector being defined by a grouping of industries based on cluster analysis of their supply chains and economic rationale. The 39 “geographies” have been defined according to either territorial or regional authority boundaries, with more disaggregation provided where there is more economic activity (e.g. upper North Island) and aggregation where there is less economic activity (e.g. West Coast of the South Island).

The SIOT has the base year of 2019. All transactions in the table are in 2019 dollars, and all economic impacts (for instance GDP, gross output, consumption, taxes) are also in 2019 dollars. The SIOT is

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<sup>22</sup> Similar to company revenue.

<sup>23</sup> There is a key difference between GDP and value added. The value added of a sector is measured net of taxes (for instance GST) and subsidies on products. In the GDP in the national accounts for New Zealand product taxes (minus subsidies) are recorded for the economy as a whole and includes as part of the value added.

<sup>24</sup> Formative uses BED measure of Total Employment Count (TEC) which includes both employment count and working proprietors.

<sup>25</sup> Includes salaries, wages and profits.

<sup>26</sup> Including household and government.

<sup>27</sup> Including income taxes, GST, government transfers and subsidies.

based on a national level 2013 Input-Output table released by Statistics New Zealand which has been converted to 2019 based on Statistics New Zealand national account data for 2019<sup>28</sup>

The national-level table has been regionalised using a hybrid approach. The hybrid approach of combining survey and non-survey (i.e. modelled) methods to regionalise an IO table which is considered the gold standard when an official SIOT is not available. The survey data sources used in the generation of the SIOT include a range of customised datasets that Formative has purchased and developed:

- ❖ **Total Employment:** Formative maintains a detailed database of employment, by geographies and industry (Business Employment Database - BED), which records the total employment in each of 506 ANZISC06 industry classes and for Statistics New Zealand's Statistical Areas, including both employees and working proprietors.<sup>29</sup>
- ❖ **Electronic Card Transactions:** Formative has purchased detailed electronic card transaction data from Marketview, which records the origin and destination of four retail and services spend types by the 39 geographies.<sup>30</sup>
- ❖ **Subnational Economic Data:** a range of information that provides valuable insight into the scale of economic activity that is located within each geography. This includes regional GDP, Gross Output and household income.

The above datasets have been combined along with non-survey regionalisation techniques to allocate the national economic activity into each of the geographies. The key method used to accomplish this is the Industry-Specific Flegg's Location Quotient ("SFLQ")<sup>31</sup>. This method employs location quotients (LQ) to understand the specialisations and structure of regional economies compared to the national economy. The use of LQs has been known to understate the amount of regional trade, however, the SFLQ approach combats this by allowing for industry-specific rates of cross hauling (where regions both import and export a product or service).

This approach has been shown to create accurate estimations of regional multipliers and outperforms other non-survey approaches<sup>32</sup>. The SFLQ method was supplemented by a gravity model to help

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<sup>28</sup> This includes gross output by sector, and national subsidies, exports, imports, change in inventories, gross fixed capital formation, consumption spending (includes households, local and central government and non-profit expenditure), compensation of employees, taxes, consumption of fixed capital and operating surplus.

<sup>29</sup> Formative (2021) Business and Employment Database – Employment Count, Working Proprietors, Total Employment.

<sup>30</sup> Marketview (2021) Card transaction data – four spend types and 39 geographies for the 2019 calendar year.

<sup>31</sup> Julia Kowalewski (2015) Regionalization of National Input–Output Tables: Empirical Evidence on the Use of the FLQ Formula, *Regional Studies*, 49:2, 240-250.

<sup>32</sup> Anthony T. Flegg, Leonardo J. Mastronardi & Carlos A. Romero (2016) Evaluating the FLQ and AFLQ formulae for estimating regional input coefficients: empirical evidence for the province of Córdoba, Argentina, *Economic Systems Research*, 28:1, 21-37.; Zhao, X., Choi, SG. On the regionalization of input–output tables with an industry-specific location quotient. *Ann Reg Sci* 54, 901–926 (2015).



inform regional flows. The SIOT has been calibrated to better match the relationships in the national Input-Output table and has been balanced using an iterative proportional fitting procedure to ensure that the table reflects regional gross-out and input. The resulting SIOT table provides a modelled estimate of the relationships within the economy. This means that the economic linkages between sector-geography combinations as of 2019 are captured in the SIOT.

The ELM uses the SIOT to estimate the potential economic activity that can be expected from changes in the economy. All economic models apply assumptions because an economy and community are too complex to replicate exactly in a mathematical system. The structure of the ELM utilises the following assumptions:

- ❖ Leontief production function, which assumes linear relationships between the production and inputs. This means a change in the output for the industry will translate into a proportional change in demands for inputs.
- ❖ No supply constraints assume that businesses can source sufficient resources (labour, capital, land, etc) to meet new demands.
- ❖ Constant returns to scale, which means that there are no economics of scale or diminishing returns in the model.
- ❖ Static prices, which assume that prices remain at 2019 values. The model does not account for substitution effect or dynamic feedback from changes in demand and prices.

## A1.2 Key modelling steps

The first step in the ELM is to establish the direct economic activity that will be generated or influenced by the proposed policy, investment, or activity. This estimation of the direct economic activity is generally conducted using financial information or developed via a first-principles understanding of how businesses or households may change their behaviour or be impacted as a result of the proposed policy, investment or activity.

The next step is to map this activity into the 65 economic sectors and 39 geographies. In most cases the direct economic activity will occur across a range of economic sectors, commonly this can be drawn from either operational or capital budgets. Similarly, in most cases, direct economic activity will accrue across multiple geographies. Therefore, the activity must be mapped into each geography to ensure that the modelling reflects the likely pattern of activity.

Finally, the mapped activity is then fed into the ELM which measures the additional economic activity that can be expected to occur within the economy as a result of the new activity. In summary, other businesses and households in the community will respond to the changes in the economy.

There are three types of economic impact the ELM calculates, direct, indirect, and induced:

- ❖ Direct impacts are the initial changes in the economy due to an economic shock (often new expenditure). The direct GDP effect is calculated based on the value of the shock and the direct employment effect is the number of jobs created by the shock itself.
- ❖ Indirect impacts arise as the firms that initially change their output as a result of an economic shock (i.e. the direct effects), purchase required inputs from their supply chain. These business-to-business transaction changes are known as the indirect impacts.
- ❖ Induced impacts flow from the direct and indirect impacts which generate wages, salaries, and profits for the households. The changed household incomes will generate more spending on goods and services. This household-to-business interaction is called induced activity.

The ELM quantifies the economic activity in each geography and sector, which includes the direct, indirect, and induced activity. The associated employment impacts are calculated assuming constant productivity – that is, each sector-geography combination produces the same amount of output per employee.