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IMV-TSX

Rating:	Speculative Buy
Target:	\$10.50
Price:	\$4.15
Return:	153%
Valuation:	NPV, 20x EPS, 12.5x EBITDA (F2026; 25% disc. rate)

Market Data

Basic Shares O/S (M)	71.5
Market capitalization (\$M)	186.7
Enterprise Value (\$M)	136.2
Pro forma cash (\$M, adj for equity o	60.1
Total debt (\$M, most rec Q)	9.5
52 Week Range	\$1.98-\$9.25
Avg. Daily Volume (M)	0.9048
Fiscal Year End	Dec-31

Milestone Watch

Phase II update, DPX-Survivac (Basket solid tumor trial)	FQ121
Phase II update, DPX-Survivac with pembrolizumab	FQ420
Interim Phase I/II DPX-Survivac ovarian cancer	FQ420
Start Phase I, DPX-COVID-19	FQ420

Financial Metrics

In C\$	2022E	2023E	2024E
Total Revenue (\$000)	5,000	5,000	5,000
EBITDA (\$000)	(15,489)	(14,793)	(13,546)
Adj net inc (\$000)	(18,394)	(17,698)	(16,451)
EPS (basic)	(\$0.26)	(\$0.25)	(\$0.23)
EPS (FD)	(\$0.24)	(\$0.23)	(\$0.22)
P/E	NA	NA	0.0x
EV/EBITDA	NA	NA	0.0x

IMV is a clinical stage biotechnology firm whose main Depovax lipid-based water-free antigen delivery technology is focused initially on oncology & infectious disease. Lead candidates DPX-Survivac & DPX-RSV advancing well in Phase I/II testing.



Source: Refinitiv, Leede Jones Gable

Initiating Coverage on Innovative Immune Therapy Developer with a Speculative BUY Rating

We are initiating coverage with a SPECULATIVE BUY rating and price target of \$10.50 on IMV, a NS-based immune therapy developer. The firm's flagship technology platform is the lipid-based water-free injectable DPX platform, which is currently led by the survivin peptide-based formulation DPX-Survivac that is still targeting several high-profile oncology markets in ongoing Phase II testing.

Investment Summary

DPX-COVID-19 ranks among the top three most advanced Canadian COVID-19 vaccine developers: The company was among the earliest of Canadian biotech firms selected by the Canadian Government for funding as it relates to the firm's preclinical stage SARS-COV-2 vaccine DPX-COVID-19. To date the firm has received ~\$10M from the government for efforts relating to this vaccine candidate. IMV expects to advance the asset into formal Phase I/II trials before end-2020. As we will demonstrate in our report below, IMV's DPX-COVID-19 vaccine addresses several pain points over its other homegrown peers, notably as it relates to rapid scale up of its manufacturing capabilities in order to meet pandemic-related demand.

Update on DPX-Survivac monotherapy ovarian cancer trial provides validating data in a hard-to-treat cancer patient population with high unmet medical need: On Dec. 6th, IMV provided an update on its Merck-partnered 22-patient DeCidE1 trial testing DPX-Survivac in patients with recurrent, advanced platinum-sensitive/platinum-resistant ovarian cancer. Available data on 19 patients indicated that 78.9% of treated patients experienced partial response or stable disease while 12-month OS was 66.1%. Durable clinical benefits persisting over 6 months were observed in 7 patients (37%), and with 5 patients (26.3%) experiencing a longer duration of clinical benefit at 11-16 months.

Although the patient population is relatively small, we were encouraged by the clinical data achieved to date, particularly given that this was a group of patients experiencing a relatively aggressive form of cancer (majority of patients received >3 lines of prior therapy and were resistant/refractory to their last platinum regimen). In a KOL call that followed subsequently, IMV noted that a majority of patients demonstrated survivin-specific CD8+ T cell response (100%/88%/83% in PR/SD/PD patients) and that DPX-Survivac was able to induce robust survivin-specific T cell response.

Separate DLBCL trial update demonstrated positive survivin-specific responses with clinical benefit: Separately, IMV presented an update on the 25-patient Phase II SPIReL trial testing DPX-Survivac in combination with Merck's PD-1 inhibitor pembrolizumab/Keytruda in patients with PD-L1 positive recurrent/refractory Diffuse Large B Cell Lymphoma (DLBCL) at the American Society of Hematology (ASH) Annual Meeting. Data for this update were focused on 7 patients who tested positive for the PD-L1 biomarker, a group which demonstrated a significantly higher median PFS of 230 days as compared to PD-L1 negative patients at 70 days.

The PD-L1+ group also demonstrated ORR/DCR at both 8.57%. Importantly, the update also surveyed for survivin-specific responses in 15 patients. Survivin-specific responses were recorded in all 3 patients (100%) who demonstrated CR, and in 3 of 4 patients (75%) who experienced a PR. Final data from this trial is anticipated by Q222 and likely will inform the design of a larger Phase II trial in 2021.

Exhibit 1. Income Statement & Financial Forecasts For IMV

<i>Year-end December 31</i> <i>(C\$000, except EPS)</i>	2019A	2020E	2021E	2022E	2023E	2024E	2025E	2026E	2027E	2028E
Licensing and milestone	0	0	0	0	0	0	0	0	0	0
Revenue - DPX-Survivac	0	0	0	0	0	0	20,460	85,640	138,910	207,922
Revenue - DPX-RSV royalties	0	0	0	0	0	0	0	40,579	87,968	134,591
Other revenue	568	5,000	5,000	5,000	5,000	5,000	5,000	5,000	5,000	5,000
Total revenue	\$568	\$5,000	\$5,000	\$5,000	\$5,000	\$5,000	\$25,460	\$131,219	\$231,878	\$347,514
Revenue growth (%)	NA	NA	NA	NA	0%	0%	409%	415%	77%	50%
Operational expenses	25,028	25,274	20,331	20,489	19,793	18,546	17,417	15,921	14,639	13,538
EBITDA	(\$24,460)	(\$20,274)	(\$15,331)	(\$15,489)	(\$14,793)	(\$13,546)	\$8,043	\$115,298	\$217,239	\$333,976
EBITDA growth (%)	NA	NA	NA	NA	NA	NA	NA	1,333%	88%	54%
EBITDA margin (%)	NA	NA	NA	NA	NA	NA	31.6%	87.9%	93.7%	96.1%
Non-operating expenses	\$1,666	\$1,666	\$1,666	\$1,666	\$1,666	\$1,666	\$1,666	\$1,666	\$1,666	\$1,666
Net interest expense (income)	\$1,239	\$1,239	\$1,239	\$1,239	\$1,239	\$1,239	\$1,239	\$1,239	\$1,239	\$1,239
Net income, fully-taxed	(\$27,365)	(\$23,179)	(\$18,236)	(\$18,394)	(\$17,698)	(\$16,451)	\$4,111	\$89,914	\$171,467	\$264,857
Fully-taxed EPS (basic)	(\$0.54)	(\$0.32)	(\$0.26)	(\$0.26)	(\$0.25)	(\$0.23)	\$0.06	\$1.26	\$2.40	\$3.71
Fully-taxed EPS (fd)	(\$0.52)	(\$0.31)	(\$0.24)	(\$0.24)	(\$0.23)	(\$0.22)	\$0.05	\$1.19	\$2.26	\$3.49
P/E (basic)	NA	NA	NA	NA	NA	NA	81.7x	3.7x	2.0x	1.3x
EV/EBITDA	NA	NA	NA	NA	NA	NA	20.0x	1.4x	0.7x	0.5x
S/O (basic; 000)	50,631	71,485	71,485	71,485	71,485	71,485	71,485	71,485	71,485	71,485
S/) (fully-diluted; 000)	52,204	75,877	75,877	75,877	75,877	75,877	75,877	75,877	75,877	75,877

Source: Company filings, Analyst forecasts and estimates

Sufficient cash burn to maintain COVID-19 vaccine research initiatives on top of existing cancer therapy priorities: IMV most recently reported FQ320 financial results for the September-end quarter. For now, our focus is on liquidity metrics pertaining to IMV, given the firm's status as a drug developer. On that, the firm exited with cash of \$54.7M, and LT debt of \$9.5M (mainly consisting of low-interest government loans). Cash of that magnitude integrates US\$24.5M/C\$33.2M from an At-the-Market facility. Using FQ320 operating expenses of \$8.4M as a proxy for current cash burn per quarter, this represents approximately 6.5 quarters or 1.6 years of cash runway.

Exhibit 2. Valuation summary for IMV

NPV, discount rate	10%	20%	25%	30%	35%	40%
Implied value per share	\$42.09	\$18.36	\$14.35	\$8.46	\$1.87	\$0.72
Price/earnings multiple, F2026	10x	15x	20x	25x	30x	40x
Implied share price ¹	\$4.85	\$7.28	\$9.71	\$12.13	\$5.81	\$4.00
EV/EBITDA multiple, F2026	5x	10x	12.5x	20x	25x	30x
Implied share price ^{1,2}	\$3.11	\$6.22	\$7.78	\$12.45	\$15.56	\$18.67
One-year IMV target price (C\$) ¹	\$10.61					

¹ Based on NPV, F2026 fully-taxed EPS forecast of \$1.19, EBITDA of \$131.2M, discounted at 25%; fd S/O of 75.9M

² EV incorporates proforma cash of \$60.1M (FQ320 cash of \$54.7M and \$5.4M in government funding) and total debt of \$9.5M

Source: Leede Jones Gable

Summary and valuation: We are formally initiating coverage on IMV with a Speculative BUY rating and \$10.50 price target. Our valuation is based on NPV (25% discount rate) and multiples of our F2026 EBITDA/EPS forecasts. Our EV incorporates cash of proforma cash of \$60.1M (consisting of FQ320 cash of \$54.7M and government funding of \$5.4M) and LT debt of \$9.5M. While the firm has an At-the-Market distribution agreement in place, no proceeds were recorded as of Nov/20 and thus omitted from our cash balance consideration. The average of our three methodologies yields a PT of \$10.61, which we round to \$10.50. At the current share price our PT corresponds to a one-year return of 153%.

Exhibit 3. Clinical Pipeline for IMV's DPX Portfolio, Led By Oncology-Focused DPX-Survivac But With Multiple Attractive DPX Formulations On the Horizon

Asset	Collaborators	Indication	Clinical Stage				Updates
			Preclinical	I	II	III	
DPX-Survivac	-	Ovarian cancer	in combination with Keytruda				Topline data reported on Dec. 3 2020
DPX-Survivac	Merck, Sunnybrook Hospital	DLBCL ²	in combination with Keytruda				Phase II data updated on Dec. 6 2020
DPX-Survivac	Merck	Multiple/Basket Trial ³	in combination with Keytruda				Phase II update by Q121
DPX-SurMAGE/CPA	CHU de Québec-Université Laval	Bladder	in combination with Keytruda				
DPX-BRAF/CPA	The Wistar Institute	Multiple Indications	in combination with Keytruda				
DPX-RSV	CIRN ¹	Respiratory Syncytial Virus (RSV)	in combination with Keytruda				
DPX-COVID-19	CIRN ¹	COVID-19	in combination with Keytruda				Phase I/II trial to commence by Q420

¹ CIRN: Canadian Immunization Research Network

² DLBCL: Diffuse large B-cell lymphoma

³ Basket Trial Indications: Lung, Bladder, Liver, Ovarian, and tumours positive for the microsatellite instability high biomarker

Source: Company Filings, Leede Jones Gable

Other clinical milestones. IMV has provided abundant updates on its DPX pipeline, most recently inviting clinical collaborators to update capital markets on DPX Survivac and its DeCidE ovarian cancer trial earlier this quarter, but we still anticipate further catalysts either imminently or in early 2021, including the following:

- An interim update by FQ121 on the Merck-partnered basket trial, testing DPX-Survivac with pembrolizumab across a number of different indications (bladder cancer, liver/hepatocellular carcinoma, ovarian cancer, lung/non-small cell lung (NSCLC) as well as tumors shown to be positive for the microsatellite instability high (MSI-H) biomarker).
- The commencement of the DPX-COVID-19 vaccine trial by this quarter (FQ420) and an update in FQ121. Although supranormal growth from DPX-COVID-19 could be anticipated in the short term, the asset remains relatively young in its clinical development profile, and we will revisit our revenue projections once this asset is further developed.
- The trial design for a potentially larger ovarian cancer pivotal trial by early 2021. In our view, DPX-Survivac fits nicely in the wide gulf straddling the absence of efficacious and tolerable treatment options between platinum-based chemotherapy and PARP inhibitors. Features of DPX-Survivac supporting our views within this patient population include the relatively milder side effect profile in contrast to other available therapies, and early signs of validation within a hard-to-treat patient population.

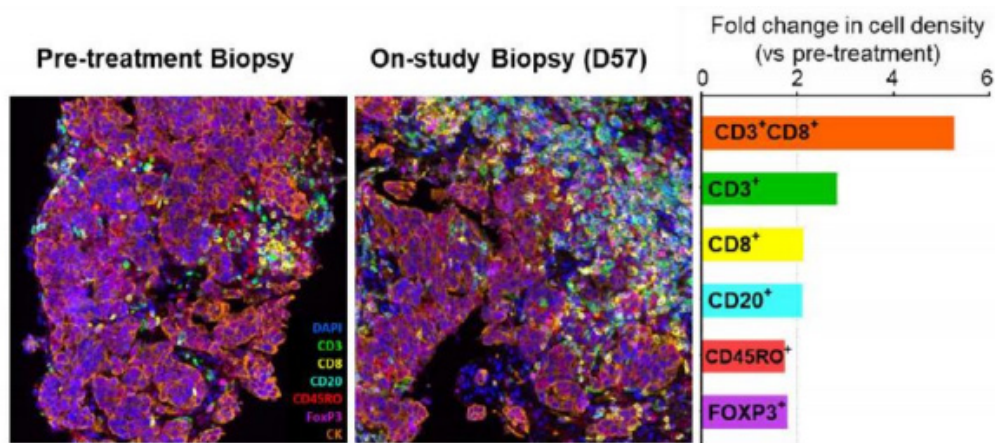
Exhibit 4. Comparison of Therapeutic Classes in Development for Ovarian Cancer (2018-2028)

Therapeutic Class	Advantages	Disadvantages
PARP Inhibitors	<ul style="list-style-type: none"> • Known biomarker • Established PFS efficacy • Platinum sensitive patients 	<ul style="list-style-type: none"> • Considerable toxicity • Less effective in platinum-refractory patients
Angiogenesis inhibitors	<ul style="list-style-type: none"> • High PFS efficacy • Part of standard of care • Targeted by both small molecules and biologics 	<ul style="list-style-type: none"> • No available biomarker • High standard set by Avastin
ADC	<ul style="list-style-type: none"> • High specificity to cancer biomarkers • Cytotoxic agent delivery 	<ul style="list-style-type: none"> • Complex design of antibody-drug linkage • Challenges in drug bioavailability inside tumour • Highly toxic payload carries risk of unwanted side effects
Gene Therapies	<ul style="list-style-type: none"> • Targeted anti-cancer activity • Innovative drug delivery • Less frequent drug administration 	<ul style="list-style-type: none"> • Non-specific targeting • Less elucidated mechanisms in ovarian cancer • Complex development and manufacturing • High cost of therapy
Checkpoint inhibitors	<ul style="list-style-type: none"> • Less toxic type of immunotherapy • Proven efficacy in other types of cancer • Good treatment rationale in combination therapy 	<ul style="list-style-type: none"> • Ovarian cancer proven to be less responsive in immunotherapy • Less effective in late-stage patients with weak immune systems • Immune related adverse events

Source: GlobalData, company filings

IMV's COVID-19 vaccine addresses a number of shortfalls experienced by other vaccine developers: Presently, IMV's DPX-COVID-19 vaccine is considered among the top three most advanced homegrown solutions to address Canada's COVID-19 vaccine demand. For now, Medicago's CoVLP vaccine remains in the lead and could potentially be approved by 2021. In the interim before other homegrown vaccine solutions are available, it is expected that Canada could be a recipient of an initial batch of 249,000 of Pfizer's/BioNTech's vaccine (representing enough dosing for 124,500 Canadians) before end-December (Pfizer's vaccine was officially approved in Canada on December 9th). The Canadian Government also has seven vaccine deals covering the supply of ~414M doses of COVID-19 vaccines. The list of vaccine developer deals can be found in our appendix, alongside Canada-specific vaccine deals conducted with the Canadian Government.

Exhibit 5. CD8+ T cell infiltration at Tumour Site with DPX-Survivac



Source: ASCO 2020

But as we note in our exhibit below, IMV's DPX-COVID-19 vaccine if successfully developed to commercialization could address some of the limitations of other leading vaccine developers both in Canada and in the US, including on time to production and cold chain management. For example, Medicago's plant-derived virus-like particle vaccine CoVLP uses the *N. benthamiana* plant (a close relative of the tobacco plant) as a bioreactor to produce the virus-like particles used in the CoVLP vaccine and this process however attractive the end-product might be, does infuse bioreactor time constraints on viral antigen production. And on cold chain management, it is now well-known that mRNA-based vaccines developed by Pfizer and Moderna do require the relevant mRNA formulations to be sustained ultra-cold temperatures (-70°C for Pfizer and -20°C for Moderna) during both shipment and storage, which of course layers logistical complexity to vaccine delivery that may not be sustainable once duration of emergency use subsides.

This is also compounded by concerns on meeting dry ice demand to fulfill the delivery of the vaccine in the US; ethanol plants that produce the carbon dioxide needed for the production of dry ice have been impacted by the ongoing pandemic, with production from these plants at ~25% less than in Dec/19. This could potentially add uncertainty to the vaccine rollout due to unclear dry ice supply and production. Thus this could be a limiting factor for the distribution of Pfizer's vaccine.

Exhibit 6. Comparison of IMV against leading COVID-19 vaccine developers in North America

	IMV	Medicago	Pfizer	Moderna
Asset	DPX-COVID-19	CoVLP	BTN-162	mRNA-1273
Vaccine type	Synthetic	Plant-derived	Synthetic	Synthetic
Proposed pricing	NA	NA	~US\$40	~US\$50-US\$74
Doses Required	NA	NA	2	2
Delivery of first dose to Canada	NA	2021	End-2020	2021
Partnerships	NA	GSK, DynaVax	BioNTech	-
Temperature (°C)	+2 to +8	-2 to -8	-70	-20
Standard cold chain management	Yes	Yes	Yes (ultra-cold chain required)	Yes (ultra-cold chain required)
In-house manufacturing	Yes	Yes	Yes	Yes
External partner to complement manufacturing	Yes (external partner with 2 sites in India and Europe)	Yes	Yes (partnering sites also identified)	Yes (partnered with Lonza)
Large-scale production ability	Yes	Yes (100M doses by 2021 but 1 week growing time required for plants to produce protein)	Yes	Yes (dependent on partner)
Raw Material Issues	NA	NA	Yes, (reported Dec 3 2020)	NA

Source: Company filings, Leede Jones Gable

Exhibit 7. Publicly-Traded Immune Therapy Or Oncology/Infectious Disease Drug Development Peers For IMV

Company	Curr	Sym	Shares out (M)	Share price 13-Dec	Mkt cap (\$M)		Ent val (\$M)		Status of lead program
					(curr)	(C\$)	(curr)	(C\$)	
Survivin-focused drug developers									
Ionis Pharmaceuticals Inc	USD	IONS	139.8	US\$46.38	6,485	\$8,283	5,200	\$6,641	LY2181308 is a survivin antisense RNA drug; licensed to Eli Lilly in Q2-03, Phase II trials completed.
Astellas Pharma Inc	JPY	4503	1,857.5	¥1,493	¥2,773,209	\$34,036	¥2,894,407	\$35,523	Astellas' YM155 was a Phase II stage survivin-inhibitor aimed tested in NSCLC, HRPC, HER2 negative breast cancer and melanoma. The drug was discontinued in 2012.
Ovarian Cancer Immunotherapy and Vaccine Peers									
Chinook Therapeutics Inc	USD	ADRO	42.2	US\$13.65	575	\$735	412	\$527	Partnership with Incyte combines LADD-based CRS-207 with epacadostat in ovarian cancer; asset discontinued in 2017
Clovis Oncology Inc	USD	CLVS	88.3	US\$4.81	424	\$542	797	\$1,018	PARP inhibitor Rubraca/rucaparib approved in BRCA-harboring ovarian cancer in 2016; PFS benefit in Phase III ARIEL3 trial in
Dynavax Technologies Corp	USD	DVAX	109.5	US\$4.57	500	\$639	503	\$642	Toll-like receptor-9-based hepatitis B vaccine Heplisav-B, FDA-approved in Nov/17
Incyte Corp	USD	INCY	218.7	US\$82.05	17,944	\$22,918	16,256	\$20,762	Oral IDO1 inhibitor epacadostat, failed pivotal trial in multiple myeloma in 2018
Iovance Biotherapeutics Inc	USD	IOVA	146.7	US\$49.48	7,258	\$9,270	6,544	\$8,358	Tumor-infiltrating lymphocyte technology; lead melanoma therapy C-144-01/lifileucel; pending BLA submission in 2021
Oxford BioMedica PLC	GBP	OXB	82.3	GBP885.0	GBP 728.3	\$1,230	GBP 688	\$1,162	Trovax is 5T4 antigen stimulating, Ankara vector based vaccine; development was terminated in 2012
Immutep Ltd	AUD	IMM	488	AUD 0.45	AUD 219	\$211	AUD 257	\$247	CVac immuno-oncology program completed Phase II ovarian cancer trial, thereafter licensed to Sydys back in May/16.
Late stage DLBCL Peers- Immunotherapy									
Kyowa Kirin Co Ltd	JPY	4151	537.2	¥2,835	¥1,522,882	\$18,690	¥1,264,795	\$15,523	Partnered with MedImmune for MEDI-551, an anti-CD19 mAb targeting DLBCL.
MorphoSys AG	EUR	MOR	32.7	EUR92.68	EUR 3,034	\$4,693	EUR 2,305	\$3,565	MOR208 is a humanized anti-CD19 mAb, approved in Jul/20 as second line for r/r DLBCL
Roche Holding AG	CHF	ROG	854.6	CHF\$305.90	CHF 261,435	\$375,211	CHF 276,323	\$396,579	Firm's RF7596/DCDS4501A (polatuzumab vedotin) is an anti-CD79b mAb targeting DLBCL; FDA approved in 2019. Acquired Santaris Pharma, which had a survivin inhibitor in development.
RSV Peers									
Bavarian Nordic A/S	DKK	BAVA	58.4	DKK 186	DKK 10,888	\$2,263	DKK 11,935	\$2,480	Live virus anti-RSV vaccine MVA-BN RSV in 421-pt Phase II RSV immune response study; 86-pt extension phase began in Nov/17, data in Q318
Novavax Inc	USD	NVAX	63.7	US\$115.09	7,327	\$9,358	7,463	\$9,532	Novavax's RSV F vaccine is a nanoparticle vaccine derived from insect cell/recomb-inant baculovirus platform; failed in Phase III adult RSV infection rate trial.
VBI Vaccines Inc	USD	VBIV	484.1	US\$3.16	1,527	\$1,951	1,423	\$1,817	Discovery-phase RSV program, based on eVLP (enveloped virus-like particle) platform; HBV vaccine approved in Israel & 14 other countries
Average						\$40,786		\$33,625	
IMV Inc	CAD	IMV	67.1	\$4.23	\$284	\$284	\$240	\$240	Lipid-based water-free antigen-delivery platform Dep-oVax; Phase I/II programs in RSV, ovarian cancer, diffuse large B-cell lymphoma, other solid tumors

Source: Refinitiv, Leede Jones Gable, Company Filings

Exhibit 8. Revenue Forecast – Ovarian Cancer

Fiscal year-end Dec-31 (C\$, unless otherwise stated)	2020E	2021E	2022E	2023E	2024E	2025E	2026E	2027E	2028E
Ovarian Cancer -US									
Ovarian cancer, current prevalence ¹	253,875	261,389	268,962	276,592	284,279	292,016	292,016	292,016	292,016
Ovarian cancer, advanced disease	60%	60%	60%	60%	60%	60%	60%	60%	60%
Ovarian cancer, relapse/second line	80%	80%	80%	80%	80%	80%	80%	80%	80%
Ovarian cancer, platinum resistant	14%	14%	14%	14%	14%	14%	14%	14%	14%
Ovarian cancer, nuclear survivin-positive	70%	70%	70%	70%	70%	70%	70%	70%	70%
Ovarian cancer, Target Patient Population	11,942	12,296	12,652	13,011	13,372	13,736	13,736	13,736	13,736
DPX-Survivac market penetration (%)	0.0%	0.0%	0.0%	0.0%	0.0%	7.5%	15.0%	18.0%	22.0%
Price per treatment, annually (US\$)	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000
Royalty rate on gross sales (%)	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%
DPX-Survivac royalty, US, ovarian cancer (US\$)	\$0	\$0	\$0	\$0	\$0	\$15,453,473	\$30,906,945	\$37,088,334	\$45,330,186
DPX-Survivac royalty, US, ovarian cancer (C\$)	\$0	\$0	\$0	\$0	\$0	\$20,460,398	\$40,920,795	\$49,104,954	\$60,017,167
Ovarian Cancer - Canada									
Ovarian cancer, current prevalence ²	12,851	13,796	14,752	15,718	16,694	17,682	17,682	17,682	17,682
Ovarian cancer, advanced disease	60%	60%	60%	60%	60%	60%	60%	60%	60%
Ovarian cancer, proportion second line	80%	80%	80%	80%	80%	80%	80%	80%	80%
Ovarian cancer, platinum resistant	14%	14%	14%	14%	14%	14%	14%	14%	14%
Ovarian cancer, nuclear survivin-positive	70%	70%	70%	70%	70%	70%	70%	70%	70%
Ovarian cancer, Target Patient Population	605	649	694	739	785	832	832	832	832
DPX-Survivac market penetration (%)	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	10.0%	15.0%	20.0%
Price per treatment, annually (C\$)	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000
Royalty rate on gross sales (%)	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%
DPX-Survivac royalty, Cda, ovarian cancer (C\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$1,039,684	\$1,559,525	\$2,079,367
Ovarian Cancer - EU									
Ovarian cancer, current prevalence ²	271,803	286,212	300,636	315,075	329,528	343,995	343,995	343,995	343,995
Ovarian cancer, advanced disease	60%	60%	60%	60%	60%	60%	60%	60%	60%
Ovarian cancer, proportion second line	80%	80%	80%	80%	80%	80%	80%	80%	80%
Ovarian cancer, platinum resistant	14%	14%	14%	14%	14%	14%	14%	14%	14%
Ovarian cancer, nuclear survivin-positive	70%	70%	70%	70%	70%	70%	70%	70%	70%
Ovarian cancer, Target Patient Population	12,786	13,463	14,142	14,821	15,501	16,182	16,182	16,182	16,182
DPX-Survivac market penetration (%)	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	5.0%	10.0%	20.0%
Price per treatment, annually (€)	€ 43,411	€ 43,411	€ 43,411	€ 43,411	€ 43,411	€ 43,411	€ 43,411	€ 43,411	€ 43,411
Royalty rate on gross sales (%)	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%
DPX-Survivac royalty, EU, ovarian cancer (€)	€ 0	€ 0	€ 0	€ 0	€ 0	€ 0	€ 8,780,606	€ 17,561,213	€ 35,122,426
DPX-Survivac royalty, EU, ovarian cancer (C\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$13,014,878	\$26,029,757	\$52,059,513
DPX-Survivac, ovarian cancer (C\$)	\$0	\$0	\$0	\$0	\$0	\$20,460,398	\$54,975,357	\$76,694,236	\$114,156,047

Source: Refinitiv, Company Filings, Leede Jones Gable

Exhibit 9. Revenue Forecast – Diffuse Large B-Cell Lymphoma (DLBCL) & RSV Infection

Fiscal year-end Dec-31 (C\$, unless otherwise stated)	2020E	2021E	2022E	2023E	2024E	2025E	2026E	2027E	2028E
Diffuse Large B-Cell Lymphoma - US									
Non-Hodgkin Lymphoma, curr. prevalence	878,212	923,722	969,581	1,015,787	1,062,337	1,109,227	1,109,227	1,109,227	1,109,227
DLBCL, estimated current prevalence	351,285	369,489	387,832	406,315	424,935	443,691	443,691	443,691	443,691
DLBCL, proportion, refractory disease	10%	10%	10%	10%	10%	10%	10%	10%	10%
DLBCL, survivin positive	58%	58%	58%	58%	58%	58%	58%	58%	58%
DLBCL, Target Patient Population	20,375	21,430	22,494	23,566	24,646	25,734	25,734	25,734	25,734
DPX-Survivac market penetration (%)	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	6.0%	12.0%	18.0%
Price per treatment, annually (US\$)	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000	\$60,000
Royalty rate on gross sales (%)	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%
DPX-Survivac royalty rev, US (US\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$23,160,668	\$46,321,336	\$69,482,004
DPX-Survivac royalty rev, US (C\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$30,664,725	\$61,329,449	\$91,994,174
Diffuse Large B-Cell Lymphoma - Canada									
Non-Hodgkin Lymphoma, curr. prevalence	28,037	32,514	37,041	41,617	46,243	50,921	50,921	50,921	50,921
DLBCL, estimated current prevalence	11,215	13,006	14,816	16,647	18,497	20,368	20,368	20,368	20,368
DLBCL, proportion, refractory disease	10%	10%	10%	10%	10%	10%	10%	10%	10%
DLBCL, survivin positive	58%	58%	58%	58%	58%	58%	58%	58%	58%
DLBCL, Target Patient Population	650	754	859	966	1,073	1,181	1,181	1,181	1,181
DPX-Survivac market penetration (%)	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	6.0%	12.0%
Price per treatment, annually (C\$)	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000	\$50,000
Royalty rate on gross sales (%)	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%
DPX-Survivac royalty rev, DLBCL, Cda (C\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$886,018	\$1,772,036
DPX-Survivac royalty rev, DLBCL (C\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$30,664,725	\$62,215,467	\$93,766,209
DPX-Survivac royalty revenue, all markets (C\$)	\$0	\$0	\$0	\$0	\$0	\$20,460,398	\$85,640,082	\$138,909,703	\$207,922,256
Respiratory Syncytial Virus - US									
Hospitalizations annually, pediatric (age <5)	65,475	66,785	68,120	69,483	70,872	72,290	73,736	75,210	76,714
Hospitalizations annually, elderly (age >65)	203,317	207,384	211,531	215,762	220,077	224,479	228,968	233,548	238,219
DPX-RSV, target population	268,792	274,168	279,652	285,245	290,950	296,769	302,704	308,758	314,933
DPX-RSV, market penetration (%)	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	6.0%	12.0%	18.0%
Cost of vaccination (US\$)	\$6,750	\$6,750	\$6,750	\$6,750	\$6,750	\$6,750	\$6,750	\$6,750	\$6,750
Royalty rate on gross sales (%)	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%
DPX-RSV royalty rev, US (US\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$30,648,775	\$62,523,501	\$95,660,957
DPX-RSV royalty rev, US (C\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$40,578,978	\$82,781,116	\$126,655,107
Respiratory Syncytial Virus - Canada									
Hospitalizations annually, pediatric (age <5)	6,548	6,678	6,812	6,948	7,087	7,229	7,374	7,521	7,671
Hospitalizations annually, elderly (age >65)	20,332	20,738	21,153	21,576	22,008	22,448	22,897	23,355	23,822
DPX-RSV, target population	26,879	27,417	27,965	28,524	29,095	29,677	30,270	30,876	31,493
DPX-RSV, market penetration (%)	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	12.0%	18.0%
Cost of vaccination (C\$)	\$5,600	\$5,600	\$5,600	\$5,600	\$5,600	\$5,600	\$5,600	\$5,600	\$5,600
Royalty rate on gross sales (%)	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%	25.0%
DPX-RSV royalty rev, Canada (C\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$5,187,135	\$7,936,316
DPX-RSV royalty rev, all markets (C\$)	\$0	\$0	\$0	\$0	\$0	\$0	\$40,578,978	\$87,968,250	\$134,591,423

Source: Leede Jones Gable

Exhibit 10. Income Statement & Financial Forecasts For IMV

Fiscal year-end Dec-31 (C\$, unless otherwise stated)	2020E	2021E	2022E	2023E	2024E	2025E	2026E	2027E	2028E
Revenue									
Licensing and milestone payments	0	0	0	0	0	0	0	0	0
Revenue - DPX-Survivac royalties	0	0	0	0	0	20,460,398	85,640,082	138,909,703	207,922,256
Revenue - DPX-RSV royalties	0	0	0	0	0	0	40,578,978	87,968,250	134,591,423
Other revenue (partnership/milestone)	5,000,000	5,000,000	5,000,000	5,000,000	5,000,000	5,000,000	5,000,000	5,000,000	5,000,000
Total Revenue (\$000's)	5,000	5,000	5,000	5,000	5,000	25,460	131,219	231,878	347,514
Operating Expenses									
G&A Expense, Net of Non-OpEx	8,389,260	8,305,367	8,222,314	8,140,091	8,058,690	7,978,103	7,898,322	7,819,339	7,741,145
R&D Expense, net of gov't assistance	16,885,080	12,025,800	12,266,316	11,653,000	10,487,700	9,438,930	8,023,091	6,819,627	5,796,683
Bus dev, accreted interest	0	0	0	0	0	0	0	0	0
Other	0	0	0	0	0	0	0	0	0
Total Operating Expense (\$000)	25,274	20,331	20,489	19,793	18,546	17,417	15,921	14,639	13,538
EBITDA (\$000's)	(20,274)	(15,331)	(15,489)	(14,793)	(13,546)	8,043	115,298	217,239	333,976
EBITDA margin (%)	NA	NA	NA	NA	NA	31.6%	87.9%	93.7%	96.1%
Non-Operating Expenses									
Amortization Expense, PP&E	528,000	528,000	528,000	528,000	528,000	528,000	528,000	528,000	528,000
Amortization Expense, Intangible Asset	0	0	0	0	0	0	0	0	0
Stock option expense	1,138,000	1,138,000	1,138,000	1,138,000	1,138,000	1,138,000	1,138,000	1,138,000	1,138,000
Loss (gain) on one time items	0	0	0	0	0	0	0	0	0
EBIT (\$000's)	(21,940)	(16,997)	(17,155)	(16,459)	(15,212)	6,377	113,632	215,573	332,310
Adjusted EBIT margin (%)	NA	NA	NA	NA	NA	25.0%	86.6%	93.0%	95.6%
Interest expense (income)	1,239,000	1,239,000	1,239,000	1,239,000	1,239,000	1,239,000	1,239,000	1,239,000	1,239,000
Effective interest rate/relative debt repayment	15.2%	15.2%	15.2%	15.2%	15.2%	15.2%	15.2%	15.2%	15.2%
EBT (\$000's)	(23,179)	(18,236)	(18,394)	(17,698)	(16,451)	5,138	112,393	214,334	331,071
Tax expense	0	0	0	0	0	1,027,673	22,478,530	42,866,798	66,214,170
Less: Income Tax Recovery	0	0	0	0	0	0	0	0	0
Effective tax rate (%)	0.0%	0.0%	0.0%	0.0%	0.0%	20.0%	20.0%	20.0%	20.0%
Net Income (loss) (\$000's)	(23,179)	(18,236)	(18,394)	(17,698)	(16,451)	4,111	89,914	171,467	264,857
Adjusted net margin (%)	NA	NA	NA	NA	NA	16%	69%	74%	76%
EBT per share (basic)	(\$0.32)	(\$0.26)	(\$0.26)	(\$0.25)	(\$0.23)	\$0.07	\$1.57	\$3.00	\$4.63
EBT per share (fd)	(\$0.31)	(\$0.24)	(\$0.24)	(\$0.23)	(\$0.22)	\$0.07	\$1.48	\$2.82	\$4.36
Fully-taxed EPS (basic)	(\$0.32)	(\$0.26)	(\$0.26)	(\$0.25)	(\$0.23)	\$0.06	\$1.26	\$2.40	\$3.71
Fully-taxed EPS (fd)	(\$0.31)	(\$0.24)	(\$0.24)	(\$0.23)	(\$0.22)	\$0.05	\$1.19	\$2.26	\$3.49
Consol shares out (basic)	71,485	71,485	71,485	71,485	71,485	71,485	71,485	71,485	71,485
Consol shares out (fd)	75,877	75,877	75,877	75,877	75,877	75,877	75,877	75,877	75,877
Legacy shares out (basic)	142,788	142,788	142,788	142,788	142,788	142,788	142,788	142,788	142,788
Legacy shares out (fd)	154,859	154,859	154,859	154,859	154,859	154,859	154,859	154,859	154,859

Source: Company filings, Leede Jones Gable

Disclosures none

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