

The global leader in developing LAG-3 therapeutics

Corporate Presentation
November 2021

- Bell Potter HEALTHCARE CONFERENCE 2021-

(ASX: IMM, NASDAQ: IMMP)

Notice: Forward-Looking Statements



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This presentation was authorised for release by the CEO, Marc Voigt.

Overview



Immutep



is an innovative biotechnology company developing novel immunotherapies for cancer and autoimmune disease

Globally active



Leadership position in LAG-3



with 4 product candidates in immuno-oncology and autoimmune disease

Clinical Potential



Immutep's product candidates have demonstrated clinical potential in a range of indications with high unmet need

Collaborating with industry leaders

















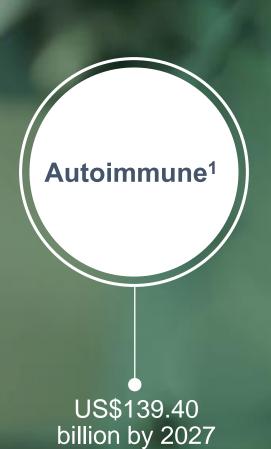
LAG-3 Pioneer: French immunologist Prof Frédéric Triebel, Immutep CMO & CSO



LAG-3 is the most promising new immune checkpoint



Exposure to two very large and growing pharmaceutical markets



growing at

2.8% CAGR



US\$222.38 billion by 2027 growing at 7.4% CAGR



LAG-3 Overview

- A validated immune checkpoint -

LAG-3 Therapeutic Landscape Overview

		Company	Program	Preclinical	Phase I	Phase II	Phase III	Total Trials	Patients
	Agonist	immutep [©]	Eftilagimod Alpha ⁽⁵⁾		10	4		14	967
		BMS	Relatlimab		7	32	2	41	9,706
		U NOVARTIS	leramilimab		1	4	SDUE C	5	960
		Merck & Co. Inc.	Favezelimab		1	5	PDUFA meeting March 19, 2022	6	1066
		Macrogenics	Tebotelimab		3	3		6	1422
λί		H-L Roche	RO7247669		1	2		3	538
Oncology	स्र	B.I.	BI754111		4	1		5	649
O	Antagonist	Regeneron ⁽¹⁾	Fianlimab		1	1		2	836
		Tesaro ⁽³⁾	TSR-033		1	1		2	139
		Incyte	INCAGN02385		1	1		2	74
		Symphogen ⁽²⁾	SYM022		3			3	169
		F-star	FS-118		2			2	102
		Innovent	IBI110		1			1	268
		Xencor	XmAb-22841		1			1	242
mune	Agonist	immutep®	IMP761						
Autoimmune	Depleting AB	gsk (4)	GSK2831781 (IMP731)		2	1		3	207

Sources: GlobalData, Company websites, clinicaltrials.gov, and sec.gov, as of **September 2021**. The green bars above represent programs conducted by Immutep &/or its partners. Total trials includes all active, completed &/or inactive trials. Patient totals are based on estimated total enrolled &/or to be enrolled. Not a complete list of currently existing LAG-3

products.
1) As of January 7, 2019 Regeneron is in full control of program and continuing development

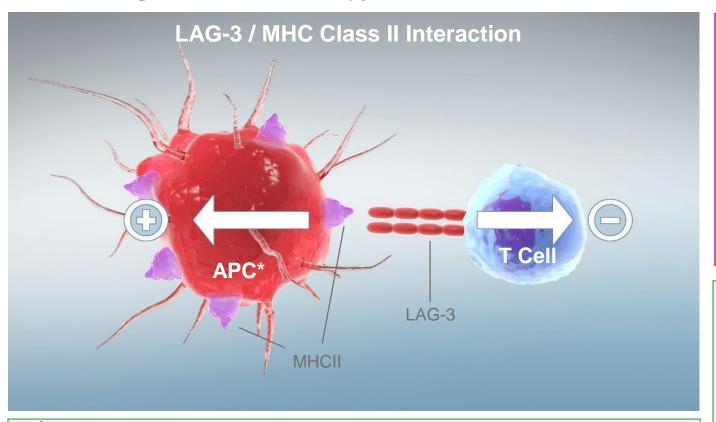
- (https://www.sec.gov/Archives/adgar/data/872589/000110/65919000977/a10-1325_18k_htm
- 2) On 3 Apr. 2020 Les Laboratoires Servier acquired Symphogen
- Tesaro-an-oncology-focused-biopharmaceutical-company/)
- 4) Includes two completed Phase I studies and one discontinued Phase 2 stud
- 5) Including IITs, two planned trials (MBC trial by EOC and HNSCC trial) and the EAT COVID trial
- 6) RELATIVITY-047 (https://investors.bms.com/iframes/press-releases/press-release-details/2021/Bristol-Myers-Squibb-Announces-RELATIVITY-047-a-Trial-Evaluating-Anti-LAG-3-Antibody-Relatlimab-and-Opdivo-nivolumab-in-Patients-with-Previously-Untreated-Metastatic-or-Unresectable-

MHC II / LAG-3 Interaction is Clinically Validated as a Therapeutic Target



LAG-3, an immune checkpoint, is widely expressed on tumor infiltrating lymphocytes (TILs) and cytotoxic T cells, and interacts with MHC class II molecules on antigen presenting cells (APCs)

→ Prime target for immune therapy



Positive regulation of antigen presenting cells (APCs) via MHC II transferred activating signals → increase in antigen presentation to cytotoxic CD8+T cells

Negative regulation of LAG-3+ T Cells



- Relatlimab + 15 more products in clinical development
- Clinical validation at ASCO/ESMO 2021 (RELATIVITY-047 - relatlimab + nivolumab in melanoma)
- PDUFA target action date is March 19, 2021*

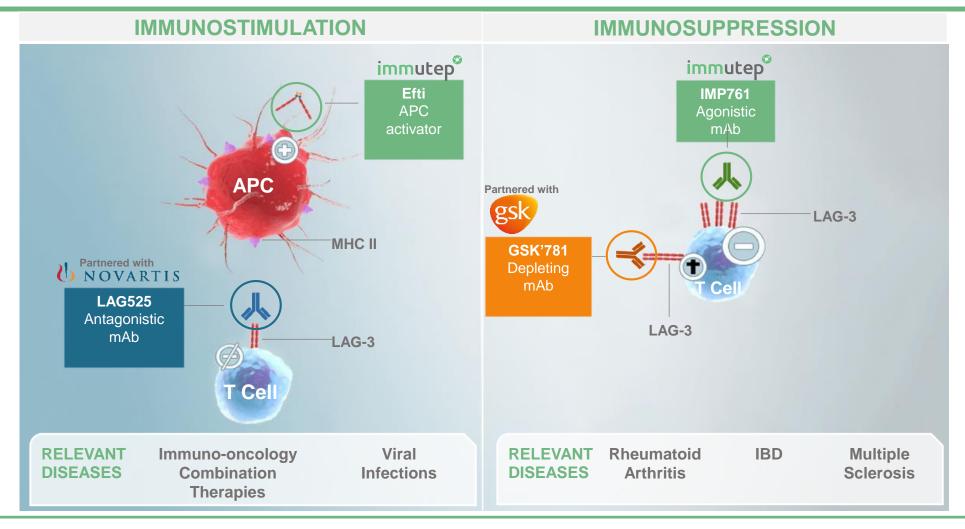
MHC II (APC) / LAG-3 (T cell) interaction is important for tumor immunology

This APC / T cell interaction is now a validated target since ASCO 2021 → 3rd validated checkpoint in immunooncology

Targeting LAG-3 / MHC II:







- ✓ Immutep is the only company with four LAG-3 related compounds, each with a different mechanism of action for treatment of numerous diseases
- ✓ Two major partnerships with pharma and two products under own development.

Immutep's LAG-3 Trial Pipeline*



	Program	Preclinical	Phase I	Phase II	Late Stage ⁽⁵⁾	Commercial Rights	Market Size ⁽⁶⁾
Oncology	Eftilagimod Alpha (efti or IMP321) APC activating soluble LAG-3 protein	Metastatic Breast Cancer (C	hemo – IO)				US\$29.9 billion
		Head and Neck Squamous C	Cell Carcinoma (IO – IO) ^(1b)		MSD INVENTING FOR LIFE		US\$1.9 billion
		Head and Neck Squamous (TACTI-002	Cell Carcinoma (IO – IO) ⁽¹⁾		MSD INVENTING FOR LIFE		110IIIIU 6.1 4 00
		Non-Small-Cell Lung Carcin TACTI-002	oma (IO – IO) ⁽¹⁾		MSD INVENTING FOR LIFE	Global Rights immutep	US\$22.6 billion
		Solid Tumors (IO – IO) ^{(2), (3a)} INSIGHT-004		Merck KGaA, Darmstadt, Germany			
		Solid Tumors (IO – IO) (2), (3b INSIGHT-005		Merck KGaA, Darmstadt, Germany	\$		
		Solid Tumors (IO – IO – che INSIGHT-003	emo) ⁽²⁾				
		Solid Tumors (Cancer Vacci YNP01 / YCP02 / CRESCEN		CYTLIMIC Grotonic T Lymphocyte Immunothiciapy in Cancer			
		Metastatic Breast Cancer (C	hemo – IO) ^(4b)	•	FEOC S	Chinese Rights	US\$2.3 billion
Inf. Dis.	Efti	COVID-19 disease (Monothe	erapy) ⁽⁷⁾			Global Rights ⁽⁸⁾	
		EAT GOVID			§		
Autoimm.	IMP761 (Agonist AB)				S	Global Rights immutep	US\$149.4 billion (2025)
Notes							

- INSIGHT Investigator Initiated Trial ("IIT") is controlled by lead investigator and therefore Immutep has no control over this (6)

- https://www.kbvresearch.com/autoimmune-disease-therapeutics-market/)

 (7) IIT conducted by University Hospital Pilsen. Immutep has no control over this trial.

Immutep Out-Licensed Immunotherapy Pipeline*





Notes

- Information in pipeline chart current as at September 202
- (1) Late stage refers to Phase IIb clinical trials or more clinically advanced clinical trials
- (1) Late stage feles to Friase his chinical trials of more chinically advanced chinical trials
- (2) Reflects completed Phase I study in healthy volunteers
- 3) Reflects completed Phase I study in healthy volunteers and in patients with plague psoriasis

- 4) https://clinicaltrials.gov/ctz/results?cond=&term=LAG525&cntry=&state=&city=&dist=
- (5) https://clinicaltrials.gov/ct2/results?cond=&term=GSK2831781&cntry=&state=&city=&dist= a
- (6) Discontinued in Jan 2021

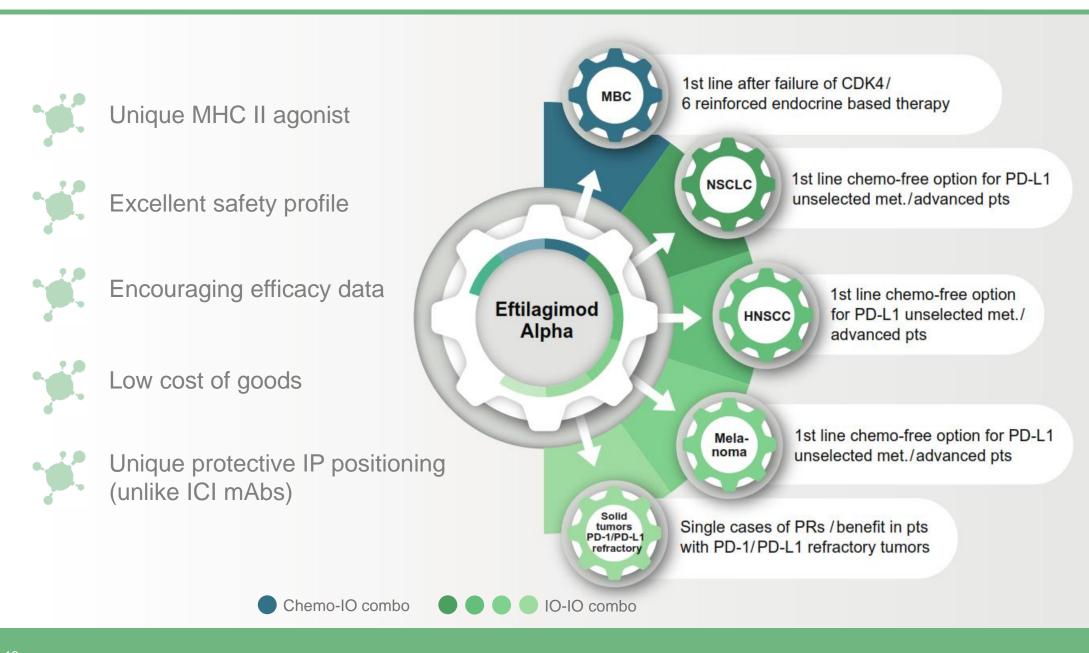


Eftilagimod Alpha (efti or IMP321)

Efti: Potential Pipeline in a Product

Potential for use in various combination settings







Efti + anti-PD-1 Combination

TACTI-002

Update from ASCO 2021



Approximately 70-80% of patients do not respond to an immune check point therapy, called anti-PD-1 monotherapy. ¹

How do we improve the immune response?

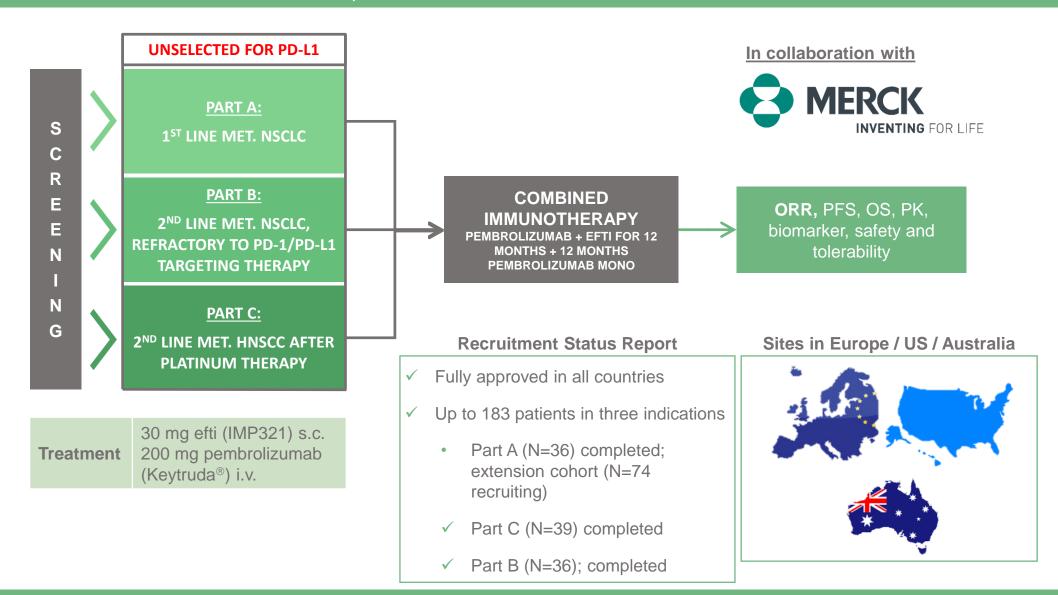
Activating antigen presenting cells with LAG-3 via MHC II.

TACTI-002 (Phase II)

Design & Status



TACTI-002: Two ACTive Immunotherapeutics in NSCLC and HNSCC



TACTI-002 Results⁽¹⁾

1st line NSCLC (Part A)



- PD-L1 distribution as expected (~70% with < 50% PD-L1 expression) → PD-L1 all comer trial
- Patients are typical NSCLC 1st line pts

Baseline parameters	N (%)
Age (years), median (range)	68.5 (53-84)
Female Male	11 (30.6) 25 (69.4)
ECOG 0 ECOG 1	15 (41.7) 21 (58.3)
Current / Ex-smokers Non-smokers	34 (94.4) 2 (5.6)
Squamous pathology Non-squamous pathology	15 (41.7) 21 (58.3)
Patients with liver metastasis	14 (38.9)

Best overall response, iRECIST, N = 36	Local Read (investigator) N (%)	Blinded Read (BICR) N (%)
Complete Response	2 (5.6)	2 (5.6)
Partial Response	11 (30.6)	13 (36.1)
Stable Disease	11 (30.6)	10 (27.8)
Progression	8 (22.2)	6 (16.7)
Not Evaluable**	4 (11.1)	5 (13.9)
Disease Control Rate	24 (66.7)	25 (69.4)
Overall Response Rate* [95% Cl interval]	13 (36.1) [20.8-53.8]	15 (41.7) [25.5-59.2]
Overall Response Rate – Evaluable pts*** [95% Cl interval]	13 (40.6) [23.7-59.4]	15 (48.4) [30.1-60.9]

^{* -} All patients stage 1 and 2 (N=36) with ≥ 1 treatment

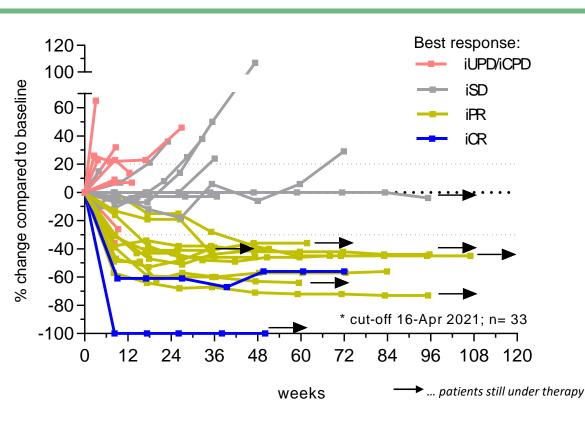
^{** -} dropped off prior to first staging or were not evaluable post-baseline for any reason

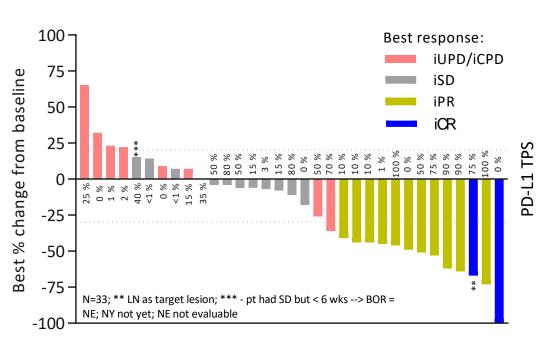
^{*** -} Evaluable for efficacy meaning \geq 1 treatment and \geq 1 post baseline tumor staging

TACTI-002 Results(1)

1st line NSCLC (Part A)







Duration of response (DoR)

- 92% responses confirmed
- 58% confirmed responses ongoing with 6+ months
- 42% of confirmed responses progressed after 6.5-13.8 months
- Median DoR estimated 13+ months

- Responses at all PD-L1 levels including 1 Complete Response with TPS of 0%
- At data cut-off, 7 pts still under therapy and 1 patient completed the 2 years of therapy

TACTI-002 Results⁽¹⁾

2nd line HNSCC (Part C)



- 2nd line treatment for patients after platinum therapy. PD-L1 all comer population
- Doubling the ORR compared to historical pembro mono results with 13.5% Complete Responses

Baseline parameters (N=39)	N (%)
Age, median (years)	62 (37-84)
Female	4 (10.3)
Male	35 (89.7)
ECOG 0	13 (33.3)
ECOG 1	26 (66.7)
Current / Ex-smokers	33 (84.6)
Non-smokers	6 (15.4)
Previous chemotherapy	39 (100)
Previous cetuximab	16 (41.0)
Lung lesions	19 (48.7)
Liver lesions	6 (17.6)

Primary tumor location (N=39)	N (%)
Oral cavity	12 (30.8)
Oropharynx	14 (35.9)
Hypopharynx	7 (17.9)
Larynx	6 (15.4)

Best overall response*, iRECIST	Investigator assessment N (%)		
Complete Response	5 (13.5)		
Partial Response	6 (16.2)		
Stable Disease	3 (8.1)		
Progression	17 (45.9)		
Not Evaluable**	6 (16.2)		
Disease Control Rate	14 (37.8)		
Overall Response Rate [95% Cl interval]	11 (29.7) [15.9-47.0]		
Overall Response Rate – Evaluable pts*** [95% Cl interval]	11 (35.5) [19.2-54.6]		

^{* -} All patients (N=37) with ≥ 1 treatment and no death due to COVID-19 prior to first post-baseline staging

All four pathologies enrolled

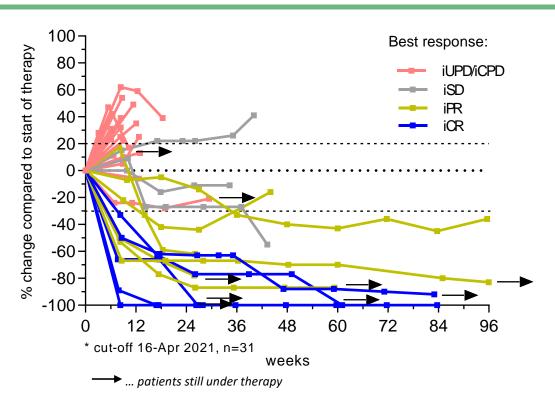
^{** -} dropped off prior to first staging or were not evaluable post-baseline for any reason

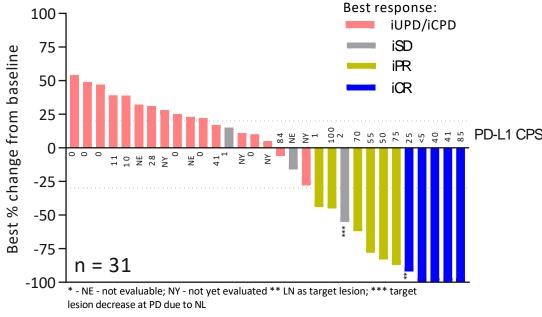
^{*** -} evaluable patients (N=31): ≥ 1 treatment and ≥ 1 post baseline tumor staging

TACTI-002 Results(1)

2nd line HNSCC (Part C)



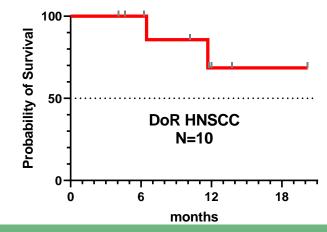




Deep responses with 5 Complete Responses Duration of response (DoR)

- 91% confirmed responses
 - 80% confirmed responses ongoing (censoring at 4-20 months)
 - No progression prior to 6 months DOR
- Median duration of response cannot be estimated yet

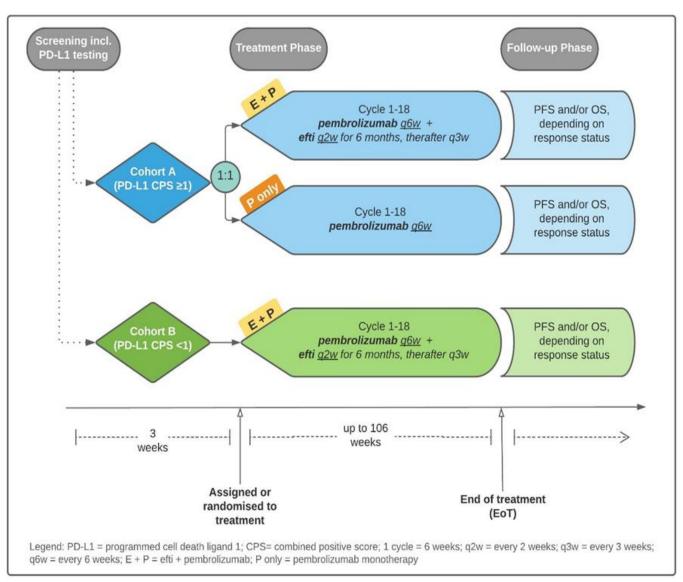
Figure 3: Duration of response (DOR) for confirmed responders



New Trail: TACTI-003 in 1st line HNSCC

Design + Status





In collaboration with



Design:

- Randomised study with ORR as primary endpoint
- Sites worldwide (AU, US, Europe)
- Approx. 154 pts: either to be randomised to have sufficient pts. in each group or in an experimental arm

Status:

- Recruiting
- Fast Track designation granted by FDA in April 2021



Efti + anti-PD-L1 Combination

INSIGHT-004

Update from ASCO 2021

INSIGHT Platform Trial in Solid Tumours

INSIGHT-004: Efti + Avelumab Combination



INSIGHT-004 is a dose escalation study evaluating efti in combination with Bavencio[®] (avelumab). Conducted as the 4th arm i.e. **Stratum D** of the INSIGHT trial.

In collaboration with



Merck KGaA, Darmstadt, Germany Institut für Klinisch-Onkologische Forschung





Phase I
Open label trial



12

Patients: 2 cohorts of 6 patients each



6 months

Combination treatment, then 6 months avelumab monotherapy



One site
Germany

Inclusion

Solid tumors

- histologically confirmed locally advanced or metastatic
- received ≤ 3 prior lines of therapy
- no selection for immunogenic markers (e.g. PD-L1 expression levels, msi high or tmb)

Treatment

- 1) Avelumab + Efti (6 mg 30 mg) s.c. qw 2 for a maximum of 6 months
- 2) Avelumab monotherapy (maintenance) gw 2 for a maximum of further 6 months

Results

RP2D, Safety, ORR, PFS, PK, PD

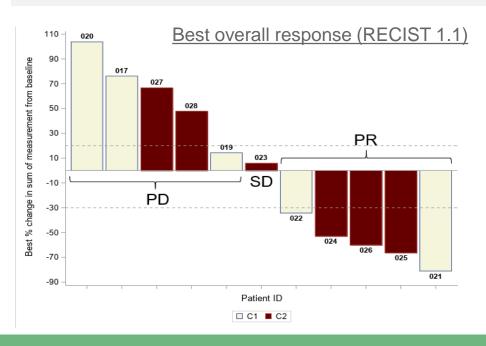
INSIGHT-004 (Stratum-D)

Final Results⁽¹⁾



Activity

- 5/12 (42%) with partial responses in different indications:
 - 1st line MSI high colorectal cancer; 1st line pleural mesothelioma; after radiochemo in squamous anal cell; pre-treated squamous cervical cancer (PD-L1 TPS < 1%) carcinoma; 3rd line gastroesophageal junction
- 75% (n=9) are still alive → 66.7% (n=4) of cohort 1 and 83.3% (n=5) of cohort 2

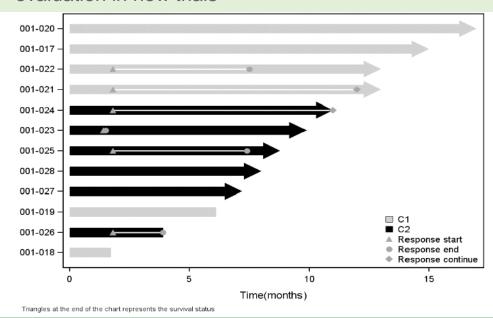


Safety

- Combo of avelumab 800 mg + efti 6 mg or 30 mg efti s.c. is feasible and safe
- No unexpected AEs

Conclusion

- Treatment with efti + avelumab safe, with promising signals of efficacy
- Efti + avelumab seems to be a potent combination for enhancing PD-L1 directed therapy and needs further evaluation in new trials





Efti + Chemo Combination AIPAC

Exciting interim Overall Survival results presented at SABCS in December 2020

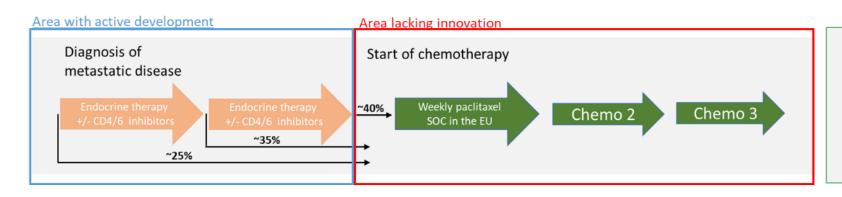
Final Overall Survival results to be presented at SITC, 10-14 November 2021

Goal: Improving Overall Survival while maintaining QoL in HR+/HER2- MBC patients



Epidemiology:

- More than 2 million breast cancer (~70% HR+/HER2-) diagnoses per annum worldwide. 1.5 million of which are under the age of 65⁽¹⁾
- Highest incidence rate among cancers: ~25% of all new cancer diagnoses among women and ~12% in the total population, including men.⁽¹⁾
- Up to 350,000 patients younger than 65 develop metastatic disease and are eligible to receive chemotherapy^{(1) (2)}



Market Size: ~US\$30 billion⁽³⁾

High Unmet Medical Need



efti addresses high unmet medical need with a good safety profile

Paclitaxel



Weekly paclitaxel well established SOC

Lack of Innovation

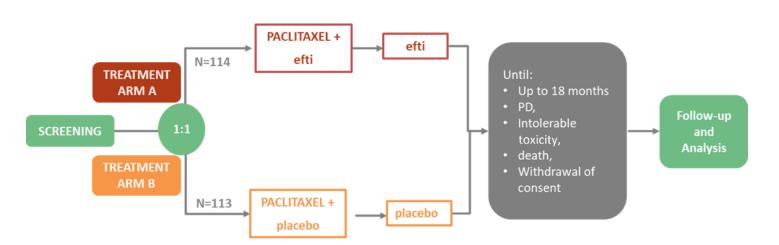


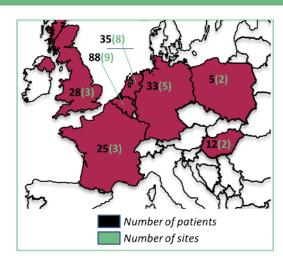
No innovation in decades & no significant innovations in the pipeline for pts receiving chemo

Efti: AIPAC (Phase IIb) design



AIPAC: Active Immunotherapy PAC litaxel in HER2-/ HR+ metastatic breast cancer (MBC)





Primary endpoint(*) (presented Mar. 2020) included:

Assessment of Progression-Free Survival (PFS)

Secondary endpoints^(*) (presented Dec. 2020) included:

- Overall Survival (OS)
- Safety and tolerability
- Overall Response Rate (ORR) and other efficacy parameters
- Biomarker and Immune Monitoring

Fact sheet

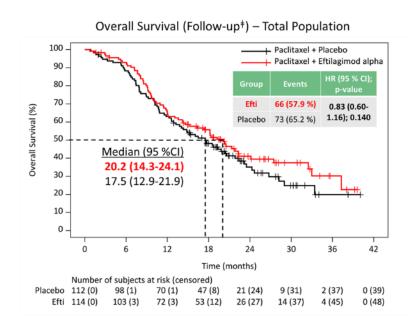
- √ Conducted in 7 EU countries
- √ Local and blinded independent central read
- √ Last Patient In enrolled Jun. 2019
- ✓ Primary analysis PFS (immature OS) Mar. 2020
- √ Follow-up 1 analysis OS Sep. 2020 (SABCS Dec. 2020) ~60% OS events
- Final OS follow-up analysis at SITC 2021

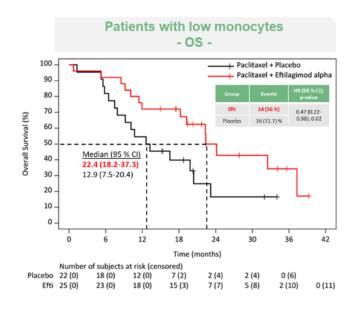
AIPAC Phase IIb Clinical Interim OS Results*

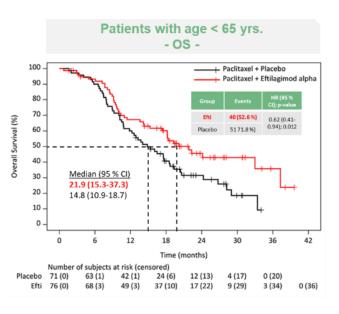


For predefined sub-groups:

Clinically meaningful absolute and relative improvement for efficacy parameters, significance for OS ESMO scale of magnitude** = level 4 (makes reimbursement very likely)







+9.1 months median OS

+7.1 months median OS

Quality of Life (QLQ-C30)

Significant deterioration of overall QoL in the placebo group at week 25, which was <u>not</u> observed in the efti group Very important for reimbursement → favorably for efti

Prior CDK 4/6

have negative impact on OS in placebo group (median reduced from 20.0 to 14.9 months), but **not** in the efti group (median OS 20.9 vs. 20.4 months)

CDK4/6 are now standard, and most patients will have received it in future studies / real world → favorably for efti

Notes

^{*} These results were presented at SABCS 2020. Data cut-off for interim overall survival results was 24 September 2020.

^{**} used for reimbursement in Europe: https://www.esmo.org/guidelines/esmo-mcbs/scale-evaluation-forms-v1.0-v1.1

AIPAC Phase IIb Clinical Final OS Results*



Overall Survival in key patient subgroups at final analysis at 72.5% of events in the overall population

Group Efti group / Comparator group		Median OS (months)	Absolute OS benefit from efti	
Total Danulation	Efti + paclitaxel	20.4	+2.9 months HR = 0.88	
Total Population	Placebo + paclitaxel	17.5	p = 0.197	
4.65	Efti + paclitaxel	22.3	+7.5 months	
< 65 years	Placebo + paclitaxel	14.8	HR = 0.66 p = 0.017	
Low monocytes	Efti + paclitaxel	32.5	+19.6 months HR = 0.44 p = 0.008	
< 0.25/nl	Placebo + paclitaxel	12.9		
Luminal B	Efti + paclitaxel	16.8	+4.2 months	
Luminai B	Placebo + paclitaxel	12.6	HR = 0.67 p = 0.049	

Note: A lower HR, means a reduced risk of death, e.g. by 56% in the low monocyte group.

Other Efti Partnerships





- EOC, an Eddingpharm spin-off holding the Chinese rights for efti, Phase I study in MBC completed with a Phase II trial in preparation
- Milestone and royalty bearing partnership



- Spin off from NEC, Japan: aims to develop cancer drugs discovered by artificial intelligence → mainly cancer vaccines
- Clinical Trial Collaboration (up to US\$5 million for Immutep); Phase I completed



- Strategic supply partnership for the manufacture of efti
- Through WuXi, Immutep was the first company to use a Chinese manufactured biologic in a European clinical trial



















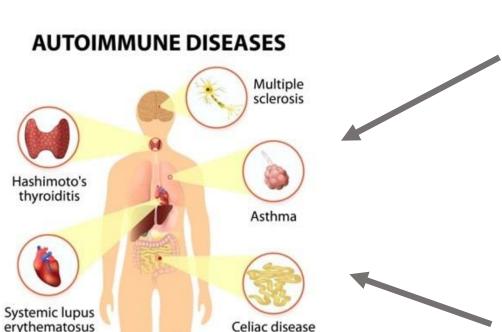




IMP761 - Autoimmune Diseases -

Broad potential in targeting auto-reactive memory T cells with IMP761



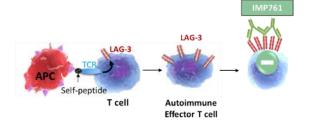


THE PRESENT: FIGHTING THE SYMPTOMS
Treating general inflammation:

corticoids, methotrexate, anti-TNF-α, -IL-6, -IL-17, -IL-23 mAbs

THE FUTURE: FIGHTING THE CAUSE Treating the disease process:

silencing the few autoimmune memory T cells accumulating at the disease site with IMP761



POTENTIAL GAME CHANGER IN AUTOIMMUNE DISEASES (US \$153.32 billion by 2025)1

Rheumatoid

arthritis

Eczema and psoriasis



Outlook

2021/2022 News Flow*



H1 2021 H2 2021 2022

- ✓ Fast Track designation granted for efti in 1st line
 HNSCC from US FDA
- Data from TACTI-002 & final data from INSIGHT-004 at ASCO
- ✓ Expansion of existing programs, adding:
 - ✓ Second collaboration with MSD for TACTI-003
 - ✓ First triple combination therapy with efti in INSIGHT-003
 - ✓ New collaboration with Merck KGaA for INSIGHT-005
- Patent protection strengthened
- √ Financial position significantly strengthened
 - ✓ Validation of LAG-3/MHC-II interaction through BMS's Phase III results in melanoma

- ☐ Final data from **AIPAC**: 2nd OS follow up at SITC
- Start & ongoing recruitment of new randomised trial in 1st line HNSCC (TACTI-003) in 2021/2022
- ✓ Part B of TACTI-002 fully recruited
- Recruitment into Part A extension & further data from **TACTI-002** in 2021 and 2022
- ✓ **INSIGHT-003** first patient enrolled in Q3 2021 and first interim results in 2022
- Manufacturing scale up to 2,000 L
- Ongoing regulatory engagement
- Updates from IMP761
- Further updates from partnered programs (e.g. GSK, Novartis, EAT COVID, CYTLIMIC and EOC Pharma)

Corporate Snapshot



Ticker symbols	IMM (ASX) IMMP (NASDAQ)
Securities on issue ⁽¹⁾	~ 853.9 million ordinary shares
Cash balance as at 30 September 2021	~ A\$106.4 million (US\$76.7 million)
Market Cap ⁽²⁾	~ A\$559.3 million (US\$413.8 million)

Notes

^{(1) ~32.16%} of the ordinary shares are represented by ADSs listed on NASDAQ where 1 ADS represents 10 ordinary shares as at 8 November 2021

⁽²⁾ Market capitalization based on ASX share price of A\$0.655 on 8 November 2021 and basic ordinary shares outstanding.

US equivalent of amounts above are based on foreign exchange rate for AUD/USD of 0.7398 per RBA rate as at 8 November 2021 for market capitalization, and the US cash & cash equivalents amount was calculated using FX rate of 0.7206 per RBA rate as at 30 September 2021.

Summary



Global leadership position in LAG-3 with 4 LAG-3 related product candidates in immuno-oncology and autoimmune disease

Multiple active clinical trials (including partnered candidates), with further significant data read-outs expected in 2021 and into 2022

Compelling clinical data from efti & strong rationale to combine with multiple FDA approved treatments

Established collaborations with e.g. Merck (MSD), Pfizer, Merck KGaA, Novartis and GSK



Thank You