

EULAR Abs: Clean Filgo P2b 108-Wk LTE Data Quick Note

Galapagos and partner Gilead are slated to present a poster with data from their long-term extension P2b study (DARWIN 3) with filgotinib (oral JAK1 inhibitor) in moderate-to-severely active rheumatoid arthritis on June 16, 2018 during a poster session at EULAR. The abstract (#SAT0200; Long Term Safety of Filgotinib in the Treatment of Rheumatoid Arthritis: Week 108 Data from a Phase 2B Open-Label Extension Study) highlighted an impressive long-term safety profile further solidifying filgotinib as the cleanest JAK1 inhibitor (see [Fig. 1](#)). Efficacy was also robust and durable with 68% achieving ACR50 and 72% achieving Low Disease Activity (per DAS28-CRP<3.2) at week 108 in 491 patients. This follows the disappointing baricitinib RA ADCOM, where concerns around a dose-dependent increase in VTE (DVT and PE) events shut down any likelihood of a 4mg approval (we don't expect a 2mg approval either, see [note](#)). A second baricitinib CRL is a positive for GLPG, in our view, and will focus attention on upadacitinib's nearly comparable VTE rate. *We find the EULAR abstract top-line findings from DARWIN 3 LTE safety study to be encouraging and reaffirm our thesis that filgotinib is the best-in-class JAK1 inhibitor.*

- Comparable Efficacy and Superior Safety Profile Puts Filgotinib as Best-In-Class, Despite Being Behind.** Compared to the updated upadacitinib P2b LTE trial (BALANCE-EXTEND) which had a VTE rate of 0.7 per 100 PYE at 72 weeks, filgotinib's P2b LTE trial (DARWIN 3) impressed with a VTE rate of 0.1 per 100 PYE at 108 weeks. The event occurred in only one patient who experienced a DVT that led to PE. Consider that the ACR and LDA endpoints have been comparable thus far (see [note](#)). We believe filgotinib offers a superior profile that de-risks the approval path relative to upadacitinib and in light of baricitinib's unfavorable ADCOM (see [note](#)). We note the pooled VTE rates for all baricitinib treated pts from P3 controlled and LTE studies were 0.5 per 100 patient years. Despite being a year behind, we believe filgotinib's undisputed safety profile and robust efficacy will help consolidate front-line position in biologic RA therapy after MTX while ABBV's upadacitinib may face scrutiny (*or label-risks*) if compiled data indicates dose-dependent increase in VTE.
- FINCH 1 and FINCH 3 Enrolled Ahead of Schedule.** On their 1Q18 earnings call, GILD announced that FINCH 1 and 3 are fully enrolled, ahead of schedule, and we look forward to the readout of the P3 study (FINCH 2) in 2H18E with filgotinib in biologic-IR RA pts for further read-through in a placebo-controlled setting and potential efficacy in this later treatment line.
- Making Right Hires Ahead of Commercialization Efforts.** Michele Manto joined GLPG as SVP of Commercial Operations last September from ABBV, leaving an outstanding 15-yr tenure and a legendary Humira franchise as the Global General Manager of Rheumatology. We believe Mr. Manto's impressive work with Humira and extensive knowledge of the immunology market will be a tremendous asset to filgotinib's adoption in

Instinet, LLC, Equity Research

17 May 2018

Rating Remains	Buy
Target Price Remains	USD 124.00
Closing price 17 May 2018	USD 96.68

Research analysts

Americas Biotech

Christopher Marai, Ph.D. - ILLC
 Christopher.Marai@Instinet.com
 +1 212-310-5466

Allen Cha - ILLC
 allen.cha@instinet.com
 +1 212-310-5488

the EU where GLPG has a 50/50 profit split on the Benelux and EU5 regions and where there is a preference for oral small molecules over injectable.

- Atopic Dermatitis Trial De-prioritized but Not Forgotten.** ABBV and PFE have placed their bets on the growing AD market, moving their highly selective JAK1 inhibitors to late-stage trials, GILD has chosen to de-prioritize the AD indication with filgotinib, likely due to the high bar set by Dupixent and the burgeoning size of filgotinib programs. However, we see even greater potential in AD with MOR106, an anti-IL-17C mAb, which in P1 MAD study demonstrated rapid and robust efficacy of 83% of patients reaching EASI50 by Week 4 as well as very clean safety profile with no SAEs or infusion-related reactions. All adverse drug reactions were mild-moderate and transient in nature. We believe the IL-17C cytokine's role in skin inflammation makes it an attractive target for AD. Despite Dupixent's high bar, we look for robust 12 wk EASI scores, safety signals, as well as Q4W (vs. Q2W Dupixent) for market potential as MOR106 moves into the recently initiated larger 180-pt P2 trial (IGUANA).

Fig. 1: P2b Long-Term Extension Study (Filgotinib vs. Upadacitinib)

P2b LTE Results in RA	Filgotinib (LTE P2b)	Upadacitinib (LTE P2b)		
	Efficacy (n/N)			
Data Cutoff (wks)	108	72		
ACR20	87%	87%		
ACR50	68%	65%		
ACR70	48%	44%		
DAS28-CRP LDA (<3.2)	72%	72%		
Safety (per 100 PYE)				
Patient numbers (n)	739	493		
Patient years of exposure (PYE)	1931	725.1		
AE (per 100 PYE)	146.2	170.5		
Serious Aes (per 100 PYE)	5.7	9.4		
Serious Infections	1.3	2.3		
Malignancy excl. NMSC	0.6	0.8		
VTE (DVT/PE)	0.1	0.7		
Hemoglobin ↓	0.5	*	2.6	^
Lymphocytes ↓	1.2	*	2.3	~
Neutrophils ↓	0.3	*	1.4	**

Note: NMSC - Non-melanoma Skin cancer; * ≥ Grade 3; ^ Anemia; ~ Lymphopenia; ** Neutropenia

Source: Instinet research

Other Relevant EULAR 2018 Abstracts

Upadacitinib (ABBV)

Oral: OP0035 UPADACITINIB AS MONOTHERAPY: A PHASE 3 RANDOMIZED CONTROLLED DOUBLE-BLIND STUDY IN PATIENTS WITH ACTIVE RHEUMATOID ARTHRITIS AND INADEQUATE RESPONSE TO METHOTREXATE **13.06.2018**

Oral: OP0036 A PHASE 3 RANDOMIZED, PLACEBO-CONTROLLED, DOUBLE-BLIND STUDY OF UPADACITINIB (ABT-494), A SELECTIVE JAK-1 INHIBITOR, IN PATIENTS WITH ACTIVE RHEUMATOID ARTHRITIS WITH INADEQUATE RESPONSE TO CONVENTIONAL SYNTHETIC DMARDS **13.06.2018**

Poster Tour: SAT0219 UPADACITINIB IN PATIENTS WITH ACTIVE RHEUMATOID ARTHRITIS AND INADEQUATE RESPONSE OR INTOLERANCE TO BIOLOGICAL DMARDS: A PHASE 3 RANDOMIZED, PLACEBO-CONTROLLED, DOUBLE-BLIND STUDY OF A SELECTIVE JAK1 INHIBITOR **16.06.2018**

Poster: SAT0236 LONG-TERM SAFETY AND EFFICACY OF UPADACITINIB (ABT-494), AN ORAL JAK-1 INHIBITOR IN PATIENTS WITH RHEUMATOID ARTHRITIS IN AN OPEN LABEL EXTENSION STUDY **16.06.2018**

Poster: SAT0244 IMPACT OF 12 WEEKS OF UPADACITINIB TREATMENT ON INDIVIDUAL AND COMPOSITE DISEASE MEASURES IN PATIENTS WITH RHEUMATOID ARTHRITIS AND INADEQUATE RESPONSE TO CONVENTIONAL SYNTHETIC OR BIOLOGIC DMARDS **16.06.2018**

Poster: SAT0254 UPADACITINIB IMPROVES PATIENT-REPORTED OUTCOMES IN PATIENTS WITH RHEUMATOID ARTHRITIS AND INADEQUATE RESPONSE TO CONVENTIONAL SYNTHETIC DISEASE-MODIFYING ANTI-RHEUMATIC DRUGS: RESULTS FROM SELECT-NEXT **16.06.2018**

Poster: SAT0255 PATIENT REPORTED OUTCOMES OF UPADACITINIB: RESULTS FROM BIOLOGIC INADEQUATE RESPONDERS (SELECT BEYOND PHASE III TRIAL) **16.06.2018**

Poster: SAT0257 A PHASE 2B/3 RANDOMIZED, PLACEBO-CONTROLLED, DOUBLE-BLIND STUDY OF UPADACITINIB, A SELECTIVE JAK1 INHIBITOR, IN JAPANESE PATIENTS WITH ACTIVE RHEUMATOID ARTHRITIS AND INADEQUATE RESPONSE TO CONVENTIONAL SYNTHETIC DMARDS **16.06.2018**

Filgotinib (GLPG/GILD)

Poster: SAT0200 LONG TERM SAFETY OF FILGOTINIB IN THE TREATMENT OF RHEUMATOID ARTHRITIS: WEEK 108 DATA FROM A PHASE 2B OPEN-LABEL EXTENSION STUDY **16.06.2018**

Poster: SAT0231 EFFECTS OF THE JAK1-SELECTIVE INHIBITOR FILGOTINIB ON GENE EXPRESSION PROFILE IN BLOOD OF PATIENTS WITH ACTIVE RHEUMATOID ARTHRITIS **16.06.2018**

Baricitinib (INCY, LLY)

Poster Tour: SAT0218 EFFICACY AND SAFETY OF BARICITINIB IN MTX-IR PATIENTS WITH RHEUMATOID ARTHRITIS: 52 WEEK RESULTS FROM A PHASE 3 STUDY (RA-BALANCE) **16.06.2018**

Poster: SAT0237 EFFICACY OF BARICITINIB IN PATIENTS WITH RHEUMATOID ARTHRITIS WHO FAILED 2 OR MORE DMARDS **16.06.2018**

Appendix A-1

Analyst Certification

I, Christopher Marai, hereby certify (1) that the views expressed in this Research report accurately reflect my personal views about any or all of the subject securities or issuers referred to in this Research report, (2) no part of my compensation was, is or will be directly or indirectly related to the specific recommendations or views expressed in this Research report and (3) no part of my compensation is tied to any specific investment banking transactions performed by Nomura Securities International, Inc., Nomura International plc or any other Nomura Group company.

Issuer Specific Regulatory Disclosures

The terms "Nomura" and "Nomura Group" used herein refers to Nomura Holdings, Inc. and its affiliates and subsidiaries, including Nomura Securities International, Inc. ('NSI') and Instinet, LLC('ILLC'), U. S. registered broker dealers and members of SIPC.

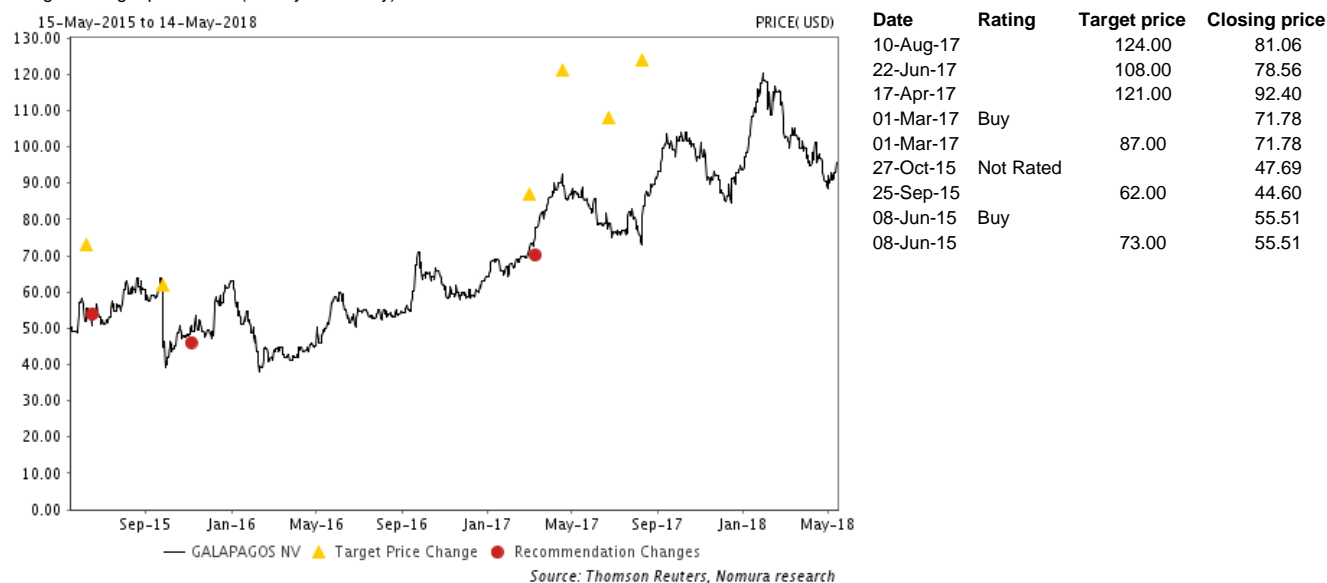
Materially mentioned issuers

Issuer	Ticker	Price	Price date	Stock rating	Sector rating	Disclosures
Galapagos NV	GLPG US	USD 96.68	17-May-2018	Buy	Not rated	A6

A6 The Nomura Group expects to receive or intends to seek compensation for investment banking services from the subject company in the next three months.

Galapagos NV (GLPG US) USD 96.68 (17-May-2018) Buy (Sector rating: Not rated)

Rating and target price chart (three year history)



For explanation of ratings refer to the stock rating keys located after chart(s)

Valuation Methodology For Galapagos NV (GLPG), we use a top-line revenue multiple valuation, a method widely used for early-stage biotech companies. Our target price of \$124 represents a 6x multiple for EU profit share on filgotinib across inflammatory indications and a 16x multiple for U.S. royalties on filgotinib. In filgotinib for RA, we apply a 15% discount rate, reflecting a lower development risk, as the target, JAK, is already validated by an approved drug in RA. In filgotinib in UC and Crohn's, we apply a 20% discount rate, reflecting a slightly higher risk for these indications, as no JAK inhibitor is approved. For the Cystic Fibrosis program, we use an 18x multiple, reflecting a higher value for the higher-margin orphan program and a 25% discount that reflects a higher development risk. For the IPF program, we use an 8x multiple, reflecting a higher value for the higher-margin orphan program and a 45% discount that reflects a higher development risk. The benchmark for this stock is the Nasdaq Biotechnology Index.

Risks that may impede the achievement of the target price Regulatory risk: The FDA may require Galapagos to present data on the efficacy of the individual triple-combo drugs in the target patient population, which would require the company to conduct a large Phase 2 study. Enrollment of patients in these studies might be challenging, due to the low expectation of efficacy from a single compound. For filgotinib, the FDA may issue a class label on the risk for serious infections and malignancies. This action will not prevent filgotinib from reaching the market, but it could create a negative perception of the drug among patients and physicians, which would affect commercial viability. Competitive risk: Baricitinib, a JAK 1/2 inhibitor, was expected to be approved by January 19, 2017. In clinical studies, the drug presented compelling efficacy superior to adalimumab. If baricitinib is found to be safe and approved without a black-box warning, it could take the lion's share of the market. Celgene's mongsersen, an SMAD7 anti-sense RNA, showed compelling safety and efficacy profile in a Phase 2 study in

CD patients. The compound is in a Phase 3 study and is set to report top-line data by 2H18. If approved, mongsersen would have first-mover advantage as the only orally available DMT for Crohn's. Clinical risk: The Phase 2 study with filgotinib in CD used the CDAI as the primary outcome measure. The Phase 3 study is using the more traditional PRO as the primary outcome measure. This difference in design may result in a smaller efficacy difference between the placebo and treatment arms in the Phase 3 study.

Important Disclosures

Online availability of research and conflict-of-interest disclosures

Nomura Group research is available on www.nomuranow.com/research, Bloomberg, Capital IQ, Factset, Reuters and ThomsonOne. Important disclosures may be read at <http://go.nomuranow.com/research/globalresearchportal/pages/disclosures/disclosures.aspx> or requested from Nomura Securities International, Inc., or Instinet, LLC on 1-877-865-5752. If you have any difficulties with the website, please email grpsupport@nomura.com for help.

The analysts responsible for preparing this report have received compensation based upon various factors including the firm's total revenues, a portion of which is generated by Investment Banking activities. Unless otherwise noted, the non-US analysts listed at the front of this report are not registered/qualified as research analysts under FINRA rules, may not be associated persons of NSI or ILLC, and may not be subject to FINRA Rule 2241 restrictions on communications with covered companies, public appearances, and trading securities held by a research analyst account.

Nomura Global Financial Products Inc. ("NGFP") Nomura Derivative Products Inc. ("NDPI") and Nomura International plc. ("NIplc") are registered with the Commodities Futures Trading Commission and the National Futures Association (NFA) as swap dealers. NGFP, NDPI, and NIplc are generally engaged in the trading of swaps and other derivative products, any of which may be the subject of this report.

Distribution of ratings (Nomura Group)

The distribution of all ratings published by Nomura Group Global Equity Research is as follows:

51% have been assigned a Buy rating which, for purposes of mandatory disclosures, are classified as a Buy rating; 42% of companies with this rating are investment banking clients of the Nomura Group*. 0% of companies (which are admitted to trading on a regulated market in the EEA) with this rating were supplied material services** by the Nomura Group.
 43% have been assigned a Neutral rating which, for purposes of mandatory disclosures, is classified as a Hold rating; 51% of companies with this rating are investment banking clients of the Nomura Group*. 0% of companies (which are admitted to trading on a regulated market in the EEA) with this rating were supplied material services by the Nomura Group
 6% have been assigned a Reduce rating which, for purposes of mandatory disclosures, are classified as a Sell rating; 6% of companies with this rating are investment banking clients of the Nomura Group*. 0% of companies (which are admitted to trading on a regulated market in the EEA) with this rating were supplied material services by the Nomura Group.

As at 31 March 2018.

*The Nomura Group as defined in the Disclaimer section at the end of this report.

** As defined by the EU Market Abuse Regulation

Distribution of ratings (Instinet, LLC)

The distribution of all ratings published by Instinet, LLC Equity Research is as follows:

61% have been assigned a Buy rating which, for purposes of mandatory disclosures, are classified as a Buy rating; Instinet LLC has provided investment banking services to 0% of companies with this rating within the previous 12 months.
 35% have been assigned a Neutral rating which, for purposes of mandatory disclosures, is classified as a Hold rating; Instinet LLC has provided investment banking services to 0% of companies with this rating within the previous 12 months.
 4% have been assigned a Reduce rating which, for purposes of mandatory disclosures, are classified as a Sell rating; Instinet LLC has provided investment banking services to 0% of companies with this rating within the previous 12 months.

Definition of Nomura Group's equity research rating system and sectors

The rating system is a relative system, indicating expected performance against a specific benchmark identified for each individual stock, subject to limited management discretion. An analyst's target price is an assessment of the current intrinsic fair value of the stock based on an appropriate valuation methodology determined by the analyst. Valuation methodologies include, but are not limited to, discounted cash flow analysis, expected return on equity and multiple analysis. Analysts may also indicate expected absolute upside/downside relative to the stated target price, defined as (target price - current price)/current price.

STOCKS

A rating of **'Buy'**, indicates that the analyst expects the stock to outperform the Benchmark over the next 12 months. A rating of **'Neutral'**, indicates that the analyst expects the stock to perform in line with the Benchmark over the next 12 months. A rating of **'Reduce'**, indicates that the analyst expects the stock to underperform the Benchmark over the next 12 months. A rating of **'Suspended'**, indicates that the rating, target price and estimates have been suspended temporarily to comply with applicable regulations and/or firm policies. Securities and/or companies that are labelled as **'Not rated'** or shown as **'No rating'** are not in regular research coverage. Investors should not expect continuing or additional information from Nomura relating to such securities and/or companies. Benchmarks are as follows: **United States/Europe/Asia ex-Japan**: please see valuation methodologies for explanations of relevant benchmarks for stocks, which can be accessed at: <http://go.nomuranow.com/research/globalresearchportal/pages/disclosures/disclosures.aspx>; **Global Emerging Markets (ex-Asia)**: MSCI Emerging Markets ex-Asia, unless otherwise stated in the valuation methodology; **Japan**: Russell/Nomura Large Cap.

SECTORS

A **'Bullish'** stance, indicates that the analyst expects the sector to outperform the Benchmark during the next 12 months. A **'Neutral'** stance, indicates that the analyst expects the sector to perform in line with the Benchmark during the next 12 months. A **'Bearish'** stance, indicates that the analyst expects the sector to underperform the Benchmark during the next 12 months. Sectors that are labelled as **'Not rated'** or shown as **'N/A'** are not assigned ratings. Benchmarks are as follows: **United States**: S&P 500; **Europe**: Dow Jones STOXX 600; **Global Emerging Markets (ex-Asia)**: MSCI Emerging Markets ex-Asia. **Japan/Asia ex-Japan**: Sector ratings are not assigned.

Target Price

A Target Price, if discussed, indicates the analyst's forecast for the share price with a 12-month time horizon, reflecting in part the analyst's estimates for the company's earnings. The achievement of any target price may be impeded by general market and macroeconomic trends, and by other risks related to the company or the market, and may not occur if the company's earnings differ from estimates.

Disclaimers

This publication contains material that has been prepared by the Nomura Group entity identified on page 1 and, if applicable, with the contributions of one or more Nomura Group entities whose employees and their respective affiliations are specified on page 1 or identified elsewhere in the publication. The term "Nomura Group" used herein refers to Nomura Holdings, Inc. and its affiliates and subsidiaries including: Nomura Securities Co., Ltd. ('NSC') Tokyo, Japan; Nomura International plc ('Nlplc'), UK; Nomura Securities International, Inc. ('NSI'), New York, US; Instinet, LLC ('ILLC'); Nomura International (Hong Kong) Ltd. ('NIHK'), Hong Kong; Nomura Financial Investment (Korea) Co., Ltd. ('NFIK'), Korea (Information on Nomura analysts registered with the Korea Financial Investment Association ('KOFIA') can be found on the KOFIA Intranet at <http://dis.kofia.or.kr>); Nomura Singapore Ltd. ('NSL'), Singapore (Registration number 197201440E, regulated by the Monetary Authority of Singapore); Nomura Australia Ltd. ('NAL'), Australia (ABN 48 003 032 513), regulated by the Australian Securities and Investment Commission ('ASIC') and holder of an Australian financial services licence number 246412; PT Nomura Sekuritas Indonesia ('PTNSI'); Nomura Securities Malaysia Sdn. Bhd. ('NSM'), Malaysia; NIHK, Taipei Branch ('NITB'), Taiwan; Nomura Financial Advisory and Securities (India) Private Limited ('NFASL'), Mumbai, India (Registered Address: Ceejay House, Level 11, Plot F, Shivsagar Estate, Dr. Annie Besant Road, Worli, Mumbai- 400 018, India; Tel: +91 22 4037 4037, Fax: +91 22 4037 4111; CIN No: U74140MH2007PTC169116, SEBI Registration No. for Stock Broking activities : BSE INB011299030, NSE INB231299034, INF231299034, INE 231299034, MCX: INE261299034; SEBI Registration No. for Merchant Banking : INM000011419; SEBI Registration No. for Research: INH000001014 and Nlplc, Madrid Branch ('Nlplc, Madrid'). 'CNS Thailand' next to an analyst's name on the front page of a research report indicates that the analyst is employed by Capital Nomura Securities Public Company Limited ('CNS') to provide research assistance services to NSL under an agreement between CNS and NSL. 'NSFSPL' next to an employee's name on the front page of a research report indicates that the individual is employed by Nomura Structured Finance Services Private Limited to provide assistance to certain Nomura entities under inter-company agreements. The "BDO-NS" (which stands for "BDO Nomura Securities, Inc.") placed next to an analyst's name on the front page of a research report indicates that the analyst is employed by BDO Unibank Inc. ("BDO Unibank") who has been seconded to BDO-NS, to provide research assistance services to NSL under an agreement between BDO Unibank, NSL and BDO-NS. BDO-NS is a Philippines securities dealer, which is a joint venture between BDO Unibank and the Nomura Group.

THIS MATERIAL IS: (I) FOR YOUR PRIVATE INFORMATION, AND WE ARE NOT SOLICITING ANY ACTION BASED UPON IT; (II) NOT TO BE CONSTRUED AS AN OFFER TO SELL OR A SOLICITATION OF AN OFFER TO BUY ANY SECURITY IN ANY JURISDICTION WHERE SUCH OFFER OR SOLICITATION WOULD BE ILLEGAL; AND (III) OTHER THAN DISCLOSURES RELATING TO THE NOMURA GROUP, BASED UPON INFORMATION FROM SOURCES THAT WE CONSIDER RELIABLE, BUT HAS NOT BEEN INDEPENDENTLY VERIFIED BY NOMURA GROUP.

Other than disclosures relating to the Nomura Group, the Nomura Group does not warrant or represent that the document is accurate, complete, reliable, fit for any particular purpose or merchantable and does not accept liability for any act (or decision not to act) resulting from use of this document and related data. To the maximum extent permissible all warranties and other assurances by the Nomura Group are hereby excluded and the Nomura Group shall have no liability for the use, misuse, or distribution of this information.

Opinions or estimates expressed are current opinions as of the original publication date appearing on this material and the information, including the opinions and estimates contained herein, are subject to change without notice. The Nomura Group is under no duty to update this document. Any comments or statements made herein are those of the author(s) and may differ from views held by other parties within Nomura Group. Clients should consider whether any advice or recommendation in this report is suitable for their particular circumstances and, if appropriate, seek professional advice, including tax advice. The Nomura Group does not provide tax advice.

The Nomura Group, and/or its officers, directors and employees, may, to the extent permitted by applicable law and/or regulation, deal as principal, agent, or otherwise, or have long or short positions in, or buy or sell, the securities, commodities or instruments, or options or other derivative instruments based thereon, of issuers or securities mentioned herein. The Nomura Group companies may also act as market maker or liquidity provider (within the meaning of applicable regulations in the UK) in the financial instruments of the issuer. Where the activity of market maker is carried out in accordance with the definition given to it by specific laws and regulations of the US or other jurisdictions, this will be separately disclosed within the specific issuer disclosures.

This document may contain information obtained from third parties, including ratings from credit ratings agencies such as Standard & Poor's. Reproduction and distribution of third-party content in any form is prohibited except with the prior written permission of the related third-party. Third-party content providers do not guarantee the accuracy, completeness, timeliness or availability of any information, including ratings, and are not responsible for any errors or omissions (negligent or otherwise), regardless of the cause, or for the results obtained from the use of such content. Third-party content providers give no express or implied warranties, including, but not limited to, any warranties of merchantability or fitness for a particular purpose or use. Third-party content providers shall not be liable for any direct, indirect, incidental, exemplary, compensatory, punitive, special or consequential damages, costs, expenses, legal fees, or losses (including lost income or profits and opportunity costs) in connection with any use of their content, including ratings. Credit ratings are statements of opinions and are not statements of fact or recommendations to purchase hold or sell securities. They do not address the suitability of securities or the suitability of securities for investment purposes, and should not be relied on as investment advice.

Any MSCI sourced information in this document is the exclusive property of MSCI Inc. ('MSCI'). Without prior written permission of MSCI, this information and any other MSCI intellectual property may not be reproduced, re-disseminated or used to create any financial products, including any indices. This information is provided on an "as is" basis. The user assumes the entire risk of any use made of this information. MSCI, its affiliates and any third party involved in, or related to, computing or compiling the information hereby expressly disclaim all warranties of originality, accuracy, completeness, merchantability or fitness for a particular purpose with respect to any of this information. Without limiting any of the foregoing, in no event shall MSCI, any of its affiliates or any third party involved in, or related to, computing or compiling the information have any liability for any damages of any kind. MSCI and the MSCI indexes are services marks of MSCI and its affiliates.

The intellectual property rights and any other rights, in Russell/Nomura Japan Equity Index belong to Nomura Securities Co., Ltd. ("Nomura") and Frank Russell Company ("Russell"). Nomura and Russell do not guarantee accuracy, completeness, reliability, usefulness, marketability, merchantability or fitness of the Index, and do not account for business activities or services that any index user and/or its affiliates undertakes with the use of the Index.

Investors should consider this document as only a single factor in making their investment decision and, as such, the report should not be viewed as identifying or suggesting all risks, direct or indirect, that may be associated with any investment decision. Nomura Group produces a number of different types of research product including, among others, fundamental analysis and quantitative analysis; recommendations contained in one type of research product may differ from recommendations contained in other types of research product, whether as a result of differing time horizons, methodologies or otherwise. The Nomura Group publishes research product in a number of different ways including the posting of product on the Nomura Group portals and/or distribution directly to clients. Different groups of clients may receive different products and services from the research department depending on their individual requirements.

Figures presented herein may refer to past performance or simulations based on past performance which are not reliable indicators of future performance. Where the information contains an indication of future performance, such forecasts may not be a reliable indicator of future performance. Moreover, simulations are based on models and simplifying assumptions which may oversimplify and not reflect the future distribution of returns. Any figure, strategy or index created and published for illustrative purposes within this document is not intended for "use" as a "benchmark" as defined by the European Benchmark Regulation.

Certain securities are subject to fluctuations in exchange rates that could have an adverse effect on the value or price of, or income derived from, the investment.

With respect to Fixed Income Research: Recommendations fall into two categories: tactical, which typically last up to three months; or strategic, which typically last from 6-12 months. However, trade recommendations may be reviewed at any time as circumstances change. 'Stop loss' levels for trades are also provided; which, if hit, closes the trade recommendation automatically. Prices and yields shown in recommendations are taken at the time of submission for publication and are based on either indicative Bloomberg, Reuters or Nomura prices and yields at that time. The prices and yields shown are not necessarily those at which the trade recommendation can be implemented.

The securities described herein may not have been registered under the US Securities Act of 1933 (the '1933 Act'), and, in such case, may not be offered or sold in the US or to US persons unless they have been registered under the 1933 Act, or except in compliance with an exemption from the registration requirements of the 1933 Act. Unless governing law permits otherwise, any transaction should be executed via a Nomura entity in your home jurisdiction.

This document has been approved for distribution in the UK and European Economic Area as investment research by Nlplc. Nlplc is authorised by the Prudential Regulation Authority and regulated by the Financial Conduct Authority and the Prudential Regulation Authority. Nlplc is a member of the London Stock Exchange. This document does not constitute a personal recommendation within the meaning of applicable regulations in the UK, or take into account the particular investment objectives, financial situations, or needs of individual investors. This document is intended only for investors who are 'eligible counterparties' or 'professional clients' for the purposes of applicable regulations in the UK, and may not, therefore, be redistributed to persons who are 'retail clients' for such purposes. This document has been approved by NIIHK, which is regulated by the Hong Kong Securities and Futures Commission, for distribution in Hong Kong by NIIHK. This document has been approved for distribution in Australia by NAL, which is authorized and regulated in Australia by the ASIC. This document has also been approved for distribution in Malaysia by NSM. In Singapore, this document has been distributed by NSL. NSL accepts legal responsibility for the content of this document, where it concerns securities, futures and foreign exchange, issued by their foreign affiliates in respect of recipients who are not accredited, expert or institutional investors as defined by the Securities and Futures Act (Chapter 289). Recipients of this document in Singapore should contact NSL in respect of matters arising from, or in connection with, this document. Unless prohibited by the provisions of Regulation S of the 1933 Act, this material is distributed in the US, by NSI, a US-registered broker-dealer, which accepts responsibility for its contents in accordance with the provisions of Rule 15a-6, under the US Securities Exchange Act of 1934. The entity that prepared this document permits its separately operated affiliates within the Nomura Group to make copies of such documents available to their clients.

This document has not been approved for distribution to persons other than 'Authorised Persons', 'Exempt Persons' or 'Institutions' (as defined by the Capital Markets Authority) in the Kingdom of Saudi Arabia ('Saudi Arabia') or 'professional clients' (as defined by the Dubai Financial Services Authority) in the United Arab Emirates ('UAE') or a 'Market Counterparty' or 'Business Customers' (as defined by the Qatar Financial Centre Regulatory Authority) in the State of Qatar ('Qatar') by Nomura Saudi Arabia, Nlplc or any other member of the Nomura Group, as the case may be. Neither this document nor any copy thereof may be taken or transmitted or distributed, directly or indirectly, by any person other than those authorised to do so into Saudi Arabia or in the UAE or in Qatar or to any person other than 'Authorised Persons', 'Exempt Persons' or 'Institutions' located in Saudi Arabia or 'professional clients' in the UAE or a 'Market Counterparty' or 'Business Customers' in Qatar. By accepting to receive this document, you represent that you are not located in Saudi Arabia or that you are an 'Authorised Person', an 'Exempt Person' or an 'Institution' in Saudi Arabia or that you are a 'professional client' in the UAE or a 'Market Counterparty' or 'Business Customers' in Qatar and agree to comply with these restrictions. Any failure to comply with these restrictions may constitute a violation of the laws of the UAE or Saudi Arabia or Qatar.

Notice to Canadian Investors: This research report is not a personal recommendation and does not take into account the investment objectives, financial situation or particular needs of any particular individual or account. It is made available to you in reliance on NI 31-103, section 8.25.

For report with reference of TAIWAN public companies or authored by Taiwan based research analyst:

THIS DOCUMENT IS SOLELY FOR REFERENCE ONLY. You should independently evaluate the investment risks and are solely responsible for your investment decisions. **NO PORTION OF THE REPORT MAY BE REPRODUCED OR QUOTED BY THE PRESS OR ANY OTHER PERSON WITHOUT WRITTEN AUTHORIZATION FROM NOMURA GROUP.** Pursuant to Operational Regulations Governing Securities Firms Recommending Trades in Securities to Customers and/or other applicable laws or regulations in Taiwan, you are prohibited to provide the reports to others (including but not limited to related parties, affiliated companies and any other third parties) or engage in any activities in connection with the reports which may involve conflicts of interests. **INFORMATION ON SECURITIES / INSTRUMENTS NOT EXECUTABLE BY NOMURA INTERNATIONAL (HONG KONG) LTD., TAIPEI BRANCH IS FOR INFORMATIONAL PURPOSES ONLY AND IS NOT BE CONSTRUED AS A RECOMMENDATION OR A SOLICITATION TO TRADE IN SUCH SECURITIES / INSTRUMENTS.**

NO PART OF THIS MATERIAL MAY BE (I) COPIED, PHOTOCOPIED, OR DUPLICATED IN ANY FORM, BY ANY MEANS; OR (II) REDISTRIBUTED WITHOUT THE PRIOR WRITTEN CONSENT OF A MEMBER OF THE NOMURA GROUP. If this document has been distributed by electronic transmission, such as e-mail, then such transmission cannot be guaranteed to be secure or error-free as information could be intercepted, corrupted, lost, destroyed, arrive late or incomplete, or contain viruses. The sender therefore does not accept liability for any errors or omissions in the contents of this document, which may arise as a result of electronic transmission. If verification is required, please request a hard-copy version.

The Nomura Group manages conflicts with respect to the production of research through its compliance policies and procedures (including, but not limited to, Conflicts of Interest, Chinese Wall and Confidentiality policies) as well as through the maintenance of Chinese Walls and employee training.

Additional information regarding the methodologies or models used in the production of any investment recommendations contained within this document is available upon request by contacting the Research Analysts listed on the front page. Disclosures information is available upon request and disclosure information is available at the Nomura Disclosure web

page: <http://go.nomuranow.com/research/globalresearchportal/pages/disclosures/disclosures.aspx>

Copyright © 2018 Instinet Incorporated and/or its affiliates. All rights reserved.