Daiichi Sankyo Cancer Enterprise
R&D Day

Joji Nakayama, President and CEO, Daiichi Sankyo Co., LTD
Antoine Yver, Chair, Daiichi Sankyo Cancer Enterprise

December 13, 2016
Forward-looking statements

Management strategies and plans, financial forecasts, future projections and policies, and R&D information that Daiichi Sankyo discloses in this material are all classified as Daiichi Sankyo's future prospects. These forward looking statements were determined by Daiichi Sankyo based on information obtained as of today with certain assumptions, premises and future forecasts, and thus, there are various inherent risks as well as uncertainties involved. As such, please note that actual results of Daiichi Sankyo may diverge materially from Daiichi Sankyo’s outlook or the content of this material. Furthermore, there is no assurance that any forward-looking statements in this material will be realized. Regardless of the actual results or facts, Daiichi Sankyo is not obliged and does not have in its policy the duty to update the content of this material from the date of this material onward.

Compounds under discussion are investigational agents and are not approved by the FDA or any other regulatory agency worldwide as a treatment for indications under investigation. Efficacy and safety have not been established in areas under investigation. There are no guarantee that these compounds will become commercially available in indications under investigation.

Daiichi Sankyo takes reasonable care to ensure the accuracy of the content of this material, but shall not be obliged to guarantee the absolute accuracy, appropriateness, completeness and feasibility, etc. of the information described in this material. Furthermore, any information regarding companies, organizations or any other matters outside the Daiichi Sankyo Group that is described within this material has been compiled or cited using publicly available information or other information, and Daiichi Sankyo has not performed in-house inspection of the accuracy, appropriateness, completeness and feasibility, etc. of such information, and does not guarantee the accuracy thereof.

The information described in this material may be changed hereafter without notice. Accordingly, this material or the information described herein should be used at your own judgment, together with any other information you may otherwise obtain.

This material does not constitute a solicitation of application to acquire or an offer to sell any security in the United States, Japan or elsewhere.

This material disclosed here is for reference purposes only. Final investment decisions should be made at your own discretion.

Daiichi Sankyo assumes no responsibility for any damages resulting from the use of this material or its content, including without limitation damages related to the use of erroneous information
# Contents

## CEO opening remarks
- Cancer Enterprise
- Overview
- Our approach
- ADC franchise
- AML franchise
- Other late-stage programs
- Support of 5-Year Business Plan
- Q&A
Opening Remarks

◆ 2025 Vision
Global Pharma Innovator with competitive advantage in oncology

◆ Strategic Target of 5-Year Business Plan
Establish oncology business

◆ Beginning of Transformation from April, 2016
New organization and leadership

➢ Establishment of Oncology R&D Unit

➢ Global Head, Oncology R&D, Antoine Yver, MD MSc
# Contents

- CEO opening remarks

## Cancer Enterprise

### Overview

- Our approach
- ADC franchise
- AML franchise
- Other late-stage programs

### Support of 5-Year Business Plan

### Q&A
We are on a journey to build a world-class oncology engine

**Past**
- Daiichi Sankyo has a **history of strong science and innovation**
- In April 2016, we shared our **2025 vision** – to become a **Global Pharma Innovator with a Competitive Advantage in Oncology**

**Present**
- In process of launching **Cancer Enterprise** and accelerating our most promising assets
- Today, we are excited to share our vision and progress to date

**Future**
- Cancer Enterprise is on track to support Daiichi Sankyo **5-Year Business Plan**
  - FY2020: 40+ Bn JPY
  - FY2025: ~300 Bn JPY
- We will **deliver our portfolio for patients and our 2025 vision**
Cancer Enterprise key messages (1/2)

- **DS-8201: Flagship asset**, HER2 ADC, key to Daiichi Sankyo strength in oncology
  - Broad opportunity
  - Partnership implications

- **Emerging franchises**
  - Acute Myeloid Leukemia (**AML**)
  - Antibody Drug Conjugate (**ADC**)
    technology
Cancer Enterprise key messages (2/2)

- **Powerful research engines**
  - Japan research labs, combining chemistry and biology expertise
  - Plexxikon discovery platform, enabling efficient candidate identification

- **Strategic investments** in enhanced capabilities
  - Align capabilities to aspirations
  - Strategic BD&L
Daiichi Sankyo is committed to a major transformation in oncology

**Focus our oncology portfolio** and align resources toward highest value assets

**Build a dynamic and sustainable R&D engine** with a nimble operating model

**Broaden our external engagement** to enhance the quality of our science

**Enrich our talent pool and transform our culture**
### Contents

<table>
<thead>
<tr>
<th>Section</th>
</tr>
</thead>
<tbody>
<tr>
<td>CEO opening remarks</td>
</tr>
<tr>
<td><strong>Cancer Enterprise</strong></td>
</tr>
<tr>
<td>Overview</td>
</tr>
<tr>
<td><strong>Our approach</strong></td>
</tr>
<tr>
<td>ADC franchise</td>
</tr>
<tr>
<td>AML franchise</td>
</tr>
<tr>
<td>Other late-stage programs</td>
</tr>
<tr>
<td>Support of 5-Year Business Plan</td>
</tr>
<tr>
<td>Q&amp;A</td>
</tr>
</tbody>
</table>
**Mission**
To be perfect in selecting, designing, and delivering our prioritized portfolio

**Vision**
To deliver value to cancer patients by leading in science and changing the standard of care
Existing strengths support our ambition

**Strategic collaborations**
- Corporate vision and commitment

**In-house science**
- Corporate and external support
- Medicinal chemistry
- Antibody research and protein engineering
- Scaffold-based drug discovery

**Corporate and external support**
- Corporate vision and commitment
- Strategic and proactive BD&L
- World-class external scientific board

**Accelerated development**
- World-class external scientific board
- Corporate vision and commitment
- Strategic and proactive BD&L
- World-class external scientific board

- Ruthless prioritization
- Lean operating model
- Aim for perfect delivery
We are focusing today on two emerging franchises

<table>
<thead>
<tr>
<th>ADC franchise</th>
<th>Preclinical stage</th>
<th>Clinical stage</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>DS-7300 (B7-H3 ADC)</td>
<td>U3-1402 (HER3 ADC)</td>
</tr>
<tr>
<td></td>
<td>DS-1062 (TROP2 ADC)</td>
<td>DS-8201 (HER2 ADC)</td>
</tr>
<tr>
<td></td>
<td>Additional ADCs</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>AML franchise</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>DS-1001 (IDH1)</td>
<td>DS-3032 (MDM2)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Quizartinib (FLT3)</td>
</tr>
<tr>
<td></td>
<td>DS-3201 (EZH1/2)</td>
<td>DS-3201 (EZH1/2)</td>
</tr>
<tr>
<td></td>
<td>PLX-51107 (BRD4)</td>
<td></td>
</tr>
</tbody>
</table>

As of December 2016

Note: Compounds under discussion are investigational agents and are not approved by the FDA or any other regulatory agency worldwide as a treatment for indications under investigation. Efficacy and safety have not been established in areas under investigation. There are no guarantee that these compounds will become commercially available in indications under investigation.
Contents

CEO opening remarks

Cancer Enterprise

Overview

Our approach

ADC franchise

AML franchise

Other late-stage programs

Support of 5-Year Business Plan

Q&A
Unique antibody-drug conjugate (ADC) technology
From our Japan research labs

Proprietary Drug-Linker

Proprietary payload (DXd)
Exatecan derivative

Broad platform potential
**ADC technology:** Engineered to improve on prior generation ADCs

### Prior generation ADCs
- Limited drug-to-antibody ratio (3.5-4)
- Linker instability and lack of tumoral specificity result in toxicity
- Payload related to typical chemotherapy previously received

### Our ADC technology
- Doubled drug-to-antibody ratio (7-8)
- High linker stability and more cancer-cell selective linker release
- Novel differentiated payload
  - Potent DNA topoisomerase I inhibitor
  - Effective in heterogeneous tumor microenvironment (bystander effect)
  - Very short systemic half-life
**ADC technology:** Drug load distribution

### High drug-to-antibody ratio (DAR)

<table>
<thead>
<tr>
<th>Antibody</th>
<th>T-DM1</th>
<th>DS-8201</th>
</tr>
</thead>
<tbody>
<tr>
<td>Trastuzumab</td>
<td></td>
<td>Anti-HER2 Ab</td>
</tr>
<tr>
<td>Payload</td>
<td>Tubulin inhibitor (DM1)</td>
<td>Topoisomerase I inhibitor (DXd)</td>
</tr>
<tr>
<td>DAR</td>
<td>3.5</td>
<td>7-8</td>
</tr>
</tbody>
</table>

![Graph showing drug load distribution](image)

**ADC technology: Linker stability**

**Pharmacokinetics profile**

**T-DM1, 3.6 mg/kg** (Phase 1)

<table>
<thead>
<tr>
<th>Day</th>
<th>Concentration (ng/ml)</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>1e+05</td>
</tr>
<tr>
<td>9</td>
<td>1e+04</td>
</tr>
<tr>
<td>18</td>
<td>1e+03</td>
</tr>
</tbody>
</table>

**DS-8201, 6.4 mg/kg** (Phase 1)

<table>
<thead>
<tr>
<th>Day</th>
<th>Concentration (ng/ml)</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>1e+05</td>
</tr>
<tr>
<td>9</td>
<td>1e+04</td>
</tr>
<tr>
<td>18</td>
<td>1e+03</td>
</tr>
</tbody>
</table>

**DS-8201: High linker stability and low free payload**

**ADC technology: Bystander effect**

**Bystander effect** (Preclinical, after 14 day treatment)

<table>
<thead>
<tr>
<th>Control</th>
<th>T-DM1, 10 mg/kg</th>
<th>DS-8201, 3.0 mg/kg</th>
</tr>
</thead>
<tbody>
<tr>
<td><em>Co-culture of HER2+ and HER2- tumors in vivo</em></td>
<td><em>Activity against HER2+ tumors only</em></td>
<td><em>Activity against HER2+ and HER2- tumors</em></td>
</tr>
</tbody>
</table>

Source: Ogitani-Y *et al.*, Cancer Science 2016; 107:1039–1046,
## Safety profile of various HER2 ADCs

<table>
<thead>
<tr>
<th>ADC</th>
<th>Maximum Tolerated Dose (MTD), mg/kg</th>
<th>Stage</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>DS-8201</strong></td>
<td>&gt;8  <em>MTD not reached</em></td>
<td>Phase 1</td>
</tr>
<tr>
<td>Topoisomerase I inhibitor (DXd)</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>T-DM1</strong></td>
<td>3.6</td>
<td>Phase 1</td>
</tr>
<tr>
<td>Tubulin Inhibitor (DM1)</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>XMT-1522(^1)</strong></td>
<td>&gt;2.5  <em>MTD not reached</em></td>
<td>Preclinical</td>
</tr>
<tr>
<td>Tubulin inhibitor (Auristatin F-HPA)</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>SYD-985</strong></td>
<td>2.4  <em>MTD not reached; expansion</em></td>
<td>Phase 1</td>
</tr>
<tr>
<td>DNA alkylator (Duocarmycin)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

1 Other HER2 ADCs with Tubulin inhibitor payload have not yet disclosed maximum tolerated dose


---

1 Other HER2 ADCs with Tubulin inhibitor payload have not yet disclosed maximum tolerated dose

DS-8201: HER2-ADC with potential to address significant patient unmet needs

<table>
<thead>
<tr>
<th>Unmet need in HER2+ cancers</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>T-DM1 resistant</strong> HER2+ breast cancer</td>
<td><strong>No</strong></td>
<td>approved HER2+ directed therapy</td>
</tr>
<tr>
<td><strong>Herceptin resistant</strong> HER2+ gastric cancer</td>
<td><strong>No</strong></td>
<td>approved HER2+ directed therapy</td>
</tr>
<tr>
<td><strong>HER2 low</strong>&lt;sup&gt;1&lt;/sup&gt; expressing tumors</td>
<td><strong>No</strong></td>
<td>approved therapy indicated for HER2 low</td>
</tr>
<tr>
<td>Insensitivity to <strong>checkpoint inhibitors</strong> as monotherapy</td>
<td><strong>~20%</strong></td>
<td>response rate</td>
</tr>
</tbody>
</table>

<sup>1</sup> IHC1+ or IHC2+/FISH-
DS-8201: Promising first-in-human trial data

**Highlights**
Presented at ESMO, October 2016

**Well tolerated;**
Maximum Tolerated Dose (MTD) not reached
No grade 4 AE

**Robust anti-tumor activity** in T-DM1 pre-treated breast cancer patients, gastric cancer, and HER2 low expression tumors

Anti-tumor activity at all doses tested

**Current trial status**
Late-stage HER2+ breast, gastric and other cancer, and low HER2 breast

**77** Patients treated
**10** Active sites in US & Japan
**54** More subjects relative to ESMO data

**U.S. FDA Fast Track designation** for HER2+ metastatic breast cancer
### Response rate in T-DM1 resistant breast cancer patients (Phase 1)

<table>
<thead>
<tr>
<th></th>
<th>ORR¹</th>
<th>DCR²</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Prior T-DM1 treatment</strong> (n=11*)</td>
<td><strong>Subsequent DS-8201 treatment</strong> (n=12*)</td>
<td><strong>Subsequent DS-8201 treatment</strong> (n=12*)</td>
</tr>
<tr>
<td></td>
<td>18%</td>
<td>42%</td>
</tr>
<tr>
<td></td>
<td>64%</td>
<td></td>
</tr>
</tbody>
</table>

*1/12 subjects with no information of the best response on prior T-DM1 treatment

**Strong response in ≥ 3rd line HER2+ breast cancer**

1 Overall Response Rate = [Complete Response (CR) + Partial response (PR)]
2 Disease Control Rate = [Complete Response (CR) + Partial response (PR) + Stable Disease (SD)]

Source: Tamura-K et al., abstract 4585 (LBA17), ESMO 2016
Best response to DS-8201 therapy, (Phase 1)

Potential across doses, HER2 status, and both breast and gastric cancers

Source: Tamura-K et al., abstract 4585 (LBA17), ESMO 2016
**DS-8201**: Focused pursuit of HER2+ breast and gastric cancer indications

**Laser-focus on development of pivotal package**
- Rate of response
- Duration of response
- Reproducibility
- Human safety database
- Dose justification

**Breast cancer** (T-DM1 failure)

**Global pursuit**
- United States
- Europe
- Japan

**Gastric cancer** (Herceptin failure)

**Pursuit in Japan** where patient unmet need is greatest
**DS-8201: Acceleration and tracking for first submissions in 2020**

- **Development**
  - HER2+ Breast (T-DM1 failure)
  - HER2+ Gastric (Herceptin failure)

- **Drug production for investigational use**
  - Initial units
  - Additional units

<table>
<thead>
<tr>
<th>Year</th>
<th>HER2+ Breast (T-DM1 failure)</th>
<th>HER2+ Gastric (Herceptin failure)</th>
<th>Initial units</th>
<th>Additional units</th>
</tr>
</thead>
<tbody>
<tr>
<td>2015</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2016</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2017</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2018</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2019</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2020</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2021</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2022</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
**DS-8201**: Leading position in next generation HER2-ADCs

<table>
<thead>
<tr>
<th>Payload</th>
<th>Estimated development timeline</th>
</tr>
</thead>
<tbody>
<tr>
<td>Topoisomerase I inhibitor (DXd)</td>
<td>2015</td>
</tr>
<tr>
<td>DS-8201</td>
<td><img src="triangle-blue" alt="Ph1 Dose start" /></td>
</tr>
<tr>
<td>DNA alkylator (Duocarmycin)</td>
<td><img src="triangle-blue" alt="Ph1 Dose start" /></td>
</tr>
<tr>
<td>SYD-985</td>
<td></td>
</tr>
<tr>
<td>Tubulin inhibitor</td>
<td><img src="triangle-blue" alt="Phase 1 expansion not yet started" /></td>
</tr>
<tr>
<td>MEDI4276</td>
<td></td>
</tr>
<tr>
<td>Tubulin inhibitor</td>
<td><img src="triangle-blue" alt="Phase 1 expansion not yet started" /></td>
</tr>
<tr>
<td>ARX-788</td>
<td></td>
</tr>
<tr>
<td>Tubulin inhibitor</td>
<td><img src="triangle-blue" alt="Phase 1 expansion not yet started" /></td>
</tr>
<tr>
<td>XMT-1522</td>
<td></td>
</tr>
<tr>
<td>Tubulin inhibitor</td>
<td></td>
</tr>
</tbody>
</table>

- Timing advantage
- Payload advantage

Source: Synthon, AstraZeneca, Ambrx, Mersana external materials 2016
DS-8201–I/O: Potential I/O benefit in HER2+ breast and other tumors

**Survival of mouse with human HER2-expressing tumor cells** (Preclinical)

![Graph showing survival rates](image)

- **DS-8201\(^1\) + anti-PD-1 Ab\(^2\)**
- **DS-8201\(^1\)**
- **anti-PD-1 Ab\(^2\)**
- **Control**

Day

Overall survival (%)

Source: Daiichi Sankyo Cancer Enterprise data on file
DS-8201: Development scope

- **Current development**
  - HER2+ Breast (T-DM1 failure)
  - HER2+ Gastric (Herceptin failure)

- **Planned to start 2H 2017**
  - Low HER2 expressing breast cancer
  - HER2 expressing NSCLC and CRC
  - Immuno-Oncology combination

- **Planned**
  - Tracking for 2020 submission
    - Earlier lines HER2+ breast cancer
  - Submission post 2020
ADC franchise: Expansion strategy

Our pipeline

Partnerships
## ADC franchise: Our pipeline

<table>
<thead>
<tr>
<th>Antibody target</th>
<th>Potential indications</th>
<th>Discovery</th>
<th>Preclinical</th>
<th>Phase1</th>
</tr>
</thead>
<tbody>
<tr>
<td>HER2 (DS-8201)</td>
<td>Breast, Gastric</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>HER3 (U3-1402)</td>
<td>Breast, NSCLC</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>TROP2 (DS-1062)</td>
<td>Solid Tumors</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>B7-H3 (DS-7300)</td>
<td>Solid Tumors</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Project 5</td>
<td>Solid Tumors</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Project 6</td>
<td>Solid Tumors</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Clinical stage**

| First-in-class and potential to **overcome TKI resistance** in EGFRm NSCLC |
| Best-in-class |
| First-in-class |

Note: Compounds under discussion are investigational agents and are not approved by the FDA or any other regulatory agency worldwide as a treatment for indications under investigation. Efficacy and safety have not been established in areas under investigation. There are no guarantee that these compounds will become commercially available in indications under investigation.
ADC franchise: Our Pipeline, Preclinical data

**Triple negative breast cancer**

- HER3-ADC

**Pancreatic cancer**

- TROP2-ADC

**NSCLC**

- B7-H3-ADC

Source: Daiichi Sankyo Cancer Enterprise data on file
HER3-ADC (U3-1402): Potential in EGFRm NSCLC

**HER3 expression after EGFR TKI treatment** (in-vitro cell lines)

<table>
<thead>
<tr>
<th>Gefitinib treatment</th>
<th>Fold</th>
</tr>
</thead>
<tbody>
<tr>
<td>72h</td>
<td></td>
</tr>
<tr>
<td>–</td>
<td></td>
</tr>
<tr>
<td>+</td>
<td></td>
</tr>
<tr>
<td>MDA – 468</td>
<td>3.3</td>
</tr>
<tr>
<td>BT – 20</td>
<td>2.9</td>
</tr>
<tr>
<td>HCC1937</td>
<td>2.7</td>
</tr>
<tr>
<td>HCC1143</td>
<td>2.2</td>
</tr>
<tr>
<td>HCC38</td>
<td>2</td>
</tr>
</tbody>
</table>

HER3 is upregulated by EGFR TKI therapy

**EGFRm NSCLC patient journey**

1. **1st line TKI therapy**
2. **2nd line TKI therapy for T790M+ (osimertinib)**
3. **3rd line (T790M+) No approved Drug**

**Source:** Verma-N et al., Cancer Res. 2016, Adapted from NCCN Guidelines
**ADC franchise: Partnerships**

**Immuno-Oncology partnerships** with our existing ADC assets

- HER2-ADC
- HER3-ADC
- TROP2-ADC
- B7-H3-ADC

**Partnerships to apply our ADC technology to new antibodies and targets**

- Our proprietary linker and novel payload

**I/O mechanisms** (e.g., checkpoint inhibitors)

**Additional targets**
Contents

CEO opening remarks

Cancer Enterprise
  Overview
  Our approach
  ADC franchise

AML franchise
  Other late-stage programs
  Support of 5-Year Business Plan

Q&A
No US FDA approval in AML

**Number of FDA approvals, since 2001**

- NHL
- MM
- AML
- Highlighted NHL approval
- Highlighted MM approval

Source: National Cancer Institute, FDA, CenterWatch
Molecular subtyping creates new opportunities

<table>
<thead>
<tr>
<th>AML</th>
<th>Extremely poor prognosis</th>
<th>Few treatment options</th>
</tr>
</thead>
<tbody>
<tr>
<td>~40k new cases</td>
<td>26% 5-year survival rate</td>
<td>Bridging to transplant an important lever to extend survival</td>
</tr>
<tr>
<td>• Each year in US, EU12, JP</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>FLT3-ITD AML</th>
<th>Common driver mutation</th>
<th>Particularly aggressive</th>
</tr>
</thead>
<tbody>
<tr>
<td>~25% of AML patients</td>
<td>&gt; 3 times more likely to relapse at 2 years after transplant</td>
<td></td>
</tr>
</tbody>
</table>

**Quizartinib**: Potential best-in-class FLT3 inhibitor

**First-generation multi-kinase inhibitors**

- *Lestaurtinib*\(^1\)
- *Midostaurin*\(^1\)

**Limited responses** in FLT3 AML, due to one or more of:

- Low potency
- Unfavorable PK profile
- Low selectivity
- Limited activity against blasts in bone marrow

---

**Quizartinib**

- **High potency** FLT3 inhibitor; also inhibits PDGFR, KIT
- **Favorable** PK profile
- **High selectivity** against panel of 402 kinases
- Complete and sustained inhibition of phospho-FLT3 **both in bone marrow blasts and peripheral blood**

---

1 Kinase interaction maps. Red circles indicate kinases bound, and circle size indicates binding affinity

Relapsed/Refractory FLT3-ITD AML in fit patients: Promising efficacy

Overall response rate\(^1\) to FLT3 inhibitors as single agent

<table>
<thead>
<tr>
<th>Inhibitor</th>
<th>CRc (47)</th>
<th>PR (19)</th>
<th>Overall Response Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quizartinib</td>
<td>47</td>
<td>19</td>
<td>66%</td>
</tr>
<tr>
<td>Gilteritinib</td>
<td>46</td>
<td>10</td>
<td>56%</td>
</tr>
<tr>
<td>Sorafenib</td>
<td>23</td>
<td>15</td>
<td>38%</td>
</tr>
<tr>
<td>Crenolanib</td>
<td>20</td>
<td>11</td>
<td>31%</td>
</tr>
<tr>
<td>Lestaurtinib</td>
<td>6</td>
<td>6</td>
<td>6%</td>
</tr>
<tr>
<td>Midostaurin</td>
<td>3</td>
<td>3</td>
<td>3%</td>
</tr>
</tbody>
</table>

**Highest overall response rate** among FLT3 inhibitors

Overall survival of Quizartinib (Ph. 2) vs. historical SOC\(^2\)

<table>
<thead>
<tr>
<th></th>
<th>Quizartinib</th>
<th>Historical SOC</th>
</tr>
</thead>
<tbody>
<tr>
<td>Months</td>
<td></td>
<td></td>
</tr>
<tr>
<td>0</td>
<td>100</td>
<td>100</td>
</tr>
<tr>
<td>6</td>
<td>74%</td>
<td>50%</td>
</tr>
<tr>
<td>12</td>
<td>50%</td>
<td>25%</td>
</tr>
<tr>
<td>18</td>
<td>25%</td>
<td>12.5%</td>
</tr>
<tr>
<td>24</td>
<td></td>
<td>6.25%</td>
</tr>
</tbody>
</table>

More than double median OS (~5.7 months vs. ~2 months) compared with historical SOC

1. ORR = CRc + PR. 2. Historical analysis of 183 patients with same criteria as Quizartinib trial (1990-2013)

Relapsed/Refractory FLT3-ITD AML in fit patients: Potential to bridge to transplant

Bridge to transplant

Percent bridged to transplant

<table>
<thead>
<tr>
<th>FLT3 population</th>
<th>All FLT3 mutants</th>
<th>ITD(+) only</th>
</tr>
</thead>
<tbody>
<tr>
<td>Source: Levis-M et al., Blood 2011; 117:3294-3301, Daiichi Sankyo Cancer Enterprise data on file</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Line of care</th>
<th>After 1st relapse</th>
<th>After 2nd relapse</th>
</tr>
</thead>
</table>

Nearly doubles rate of transplant

Overall survival by response to Quizartinib and subsequent transplant or no transplant (Phase 2, N=136)

<table>
<thead>
<tr>
<th>No. at risk</th>
<th>No transplant, CRc+PR (N=56)</th>
<th>No transplant, No CRc+PR (N=35)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Weeks</td>
<td>0</td>
<td>20</td>
</tr>
<tr>
<td>45</td>
<td>39</td>
<td>16</td>
</tr>
<tr>
<td>35</td>
<td>35</td>
<td>15</td>
</tr>
<tr>
<td>29</td>
<td>10</td>
<td>2</td>
</tr>
<tr>
<td>29</td>
<td>10</td>
<td>2</td>
</tr>
<tr>
<td>29</td>
<td>10</td>
<td>2</td>
</tr>
<tr>
<td>29</td>
<td>10</td>
<td></td>
</tr>
</tbody>
</table>

Transplant (N=45)
No transplant, CRc+PR (N=56)
No transplant, No CRc+PR (N=35)

Of the 35% of patients bridged to transplant, ~1/3 remained alive at 1 year

Source: Levis-M et al., Blood 2011; 117:3294-3301, Daiichi Sankyo Cancer Enterprise data on file
**Quizartinib**: Phase 3 trials in FLT3-ITD AML fit patients to change standard of care

<table>
<thead>
<tr>
<th>Induction</th>
<th>Consolidation</th>
<th>Maintenance</th>
<th>Relapsed / Refractory</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Combination with SOC chemotherapy(^1)</td>
<td>• Combination with SOC chemotherapy(^1)</td>
<td>• Monotherapy</td>
<td>• Monotherapy</td>
</tr>
<tr>
<td>• First patient dosed October 2016</td>
<td>• First patient dosed October 2016</td>
<td>• Overall Survival</td>
<td>• Overall Survival</td>
</tr>
</tbody>
</table>

*Addiction to FLT3-ITD*

**Global pursuits**

1. Induction (Cytarabine + Anthracycline + Quizartinib for 1-2 cycles); Consolidation (High dose Cytarabine + Quizartinib up to 4 cycles and/or HSCT); Maintenance (Quizartinib or Placebo up to 12 cycles)
Quizartinib: Development context

- **Filing (1st-generation FLT3)**
- **Start of registration study (Next-generation FLT3)**

### FLT3-ITD fit AML

**Induction, Consolidation, Maintenance**

- **Midostaurin**
  - Ages 18-60 only
- **Quizartinib**
  - Ages 18-75
- **Gilteritinib**
  - Maintenance only

**Relapsed/Refractory**

- **Quizartinib**
- **Gilteritinib**
- **Crenolanib**

### Estimated development timeline (Phase 3 trials)

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

- **QuANTUM-First**
- **QuANTUM-R**
- **Phase 3 study planned, not yet started**

Source: Astellas R&D Day 2016, U.S. National Institutes of Health
AML franchise: Our pipeline

Emerging classes of targets in AML

- Growth factor receptor inhibition
- Transcriptional deregulation
- Epigenetic regulation

Developing 3 of 7 emerging classes of targets

<table>
<thead>
<tr>
<th>MoA (asset)</th>
<th>Pre-clinical</th>
<th>Phase 1</th>
<th>Registration trial</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Growth factor receptor inhibition</strong></td>
<td>FLT3 (Quizartinib)</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Transcriptional deregulation</strong></td>
<td>MDM2 (DS-3032)</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Epigenetic regulation</strong></td>
<td>BRD4 (PLX-51107)</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>EZH1/2 (DS-3201)</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>IDH1 (DS-1001)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

- Address emergence of resistance
- Quicker development
- Access and pricing flexibility


Note: Compounds under discussion are investigational agents and are not approved by the FDA or any other regulatory agency worldwide as a treatment for indications under investigation. Efficacy and safety have not been established in areas under investigation. There are no guarantee that these compounds will become commercially available in indications under investigation.
AML franchise:
Re-activation of p53 by targeting MDM2 in AML and MDS

The Role of MDM2 in AML and MDS

- ~90% wild-type TP53 in de novo AML/MDS
- p53 is downregulated by overexpression of MDM2
- DS-3032 is an small-molecule oral MDM2 inhibitor

MDM2 inhibitor (DS-3032): ASH 2016 data

Anti-tumor activity of monotherapy DS-3032 in R/R AML and MDS patients, N=26 (Phase 1)

Bone marrow blast reduction in ~60% of evaluable subjects

Source: DiNardo-N et al., ASH 2016, abstract 593
AML franchise in summary

- AML has **high unmet need**
- Quizartinib has promising potential to **change SOC** for FLT3-ITD AML in fit patients
- AML franchise includes other **exciting early-stage assets**
- Daiichi Sankyo Cancer Enterprise is **well-positioned** in the changing AML landscape
## Contents

**CEO opening remarks**

**Cancer Enterprise**

- Overview
- Our approach
- ADC franchise
- AML franchise

**Other late-stage programs**

- Support of 5-Year Business Plan

**Q&A**
Update on other late-stage programs

**Pexidartinib (CSF-1R)**

- **On track to market by 2019**
- **TGCT (Phase 3)**
  - Additional safety measures implemented following cases of non-fatal, serious liver toxicity
  - Proceeding to efficacy and safety endpoint evaluation
- **Combination with I/O**
- **Multiple tumor types**
  - Dose escalation with pembrolizumab completed; Phase 1 dose expansion underway
  - Other preclinical

**Patritumab (HER3)**

- **Awaiting data**
- **Recurrent head and neck cancer (Phase 2)**
  - Combination with cetuximab and platinum
  - Accrual ongoing (65/105 patients)
- **HER2+ breast cancer (Phase 2)**

**Tivantinib (c-MET)**

- **Awaiting data**
- **Second-line HCC (Phase 3)**
  - Final analysis in H1 2017
Contents

CEO opening remarks

Cancer Enterprise

Overview

Our approach

ADC franchise

AML franchise

Other late-stage programs

Support of 5-Year Business Plan

Q&A
5-Year Business Plan: DS-8201 opportunities

Fast to market

Tracking for first submission in 2020 for breast cancer globally and gastric cancer in Japan

Low HER2 segments

Best-in-class HER2 breast cancer and first-in-class low HER2 cancers

Immuno-Oncology

‘Partner of choice’ for I/O-resistant segments

ADC franchise

Proprietary technology from our Japan labs with broad platform potential

Market potential

Meaningfully contribute to Daiichi Sankyo 5-Year Business Plan

Note: Compounds under discussion are investigational agents and are not approved by the FDA or any other regulatory agency worldwide as a treatment for indications under investigation. Efficacy and safety have not been established in areas under investigation. There are no guarantee that these compounds will become commercially available in indications under investigation.
5-Year Business Plan: CE contribution

• **Commitment** to major transformation in **oncology**

• Innovation in **science** to deliver value for **patients**

• **Perfection** in selecting, designing, and **delivering** our portfolio

• ADC and AML **franchises** from our powerful research engines

• Strategic **investments** and **partnerships** to maximize value
Looking to the future

In approximately 6-12 months, we expect to provide

• **Progress update** toward 5-Year Business Plan
• **Longer term** view for Cancer Enterprise R&D
# Contents

<table>
<thead>
<tr>
<th>Section</th>
</tr>
</thead>
<tbody>
<tr>
<td>CEO opening remarks</td>
</tr>
<tr>
<td>Cancer Enterprise</td>
</tr>
<tr>
<td>Overview</td>
</tr>
<tr>
<td>Our approach</td>
</tr>
<tr>
<td>ADC franchise</td>
</tr>
<tr>
<td>AML franchise</td>
</tr>
<tr>
<td>Other late-stage programs</td>
</tr>
<tr>
<td>Support of 5-Year Business Plan</td>
</tr>
<tr>
<td>Q&amp;A</td>
</tr>
</tbody>
</table>
# Colleagues available for questions

<table>
<thead>
<tr>
<th>Name</th>
<th>Position</th>
</tr>
</thead>
<tbody>
<tr>
<td>Glenn Gormley</td>
<td>Senior Executive Officer, Global Head of R&amp;D</td>
</tr>
<tr>
<td>Antoine Yver</td>
<td>Executive Vice President, Global Head of Oncology R&amp;D, Chair of Daiichi Sankyo Cancer Enterprise</td>
</tr>
<tr>
<td>Kouichi Akahane</td>
<td>Executive Officer, Head of Oncology Function, R&amp;D Division</td>
</tr>
<tr>
<td>Gideon Bollag</td>
<td>CEO, Plexxikon</td>
</tr>
<tr>
<td>Arnaud Lesegretain</td>
<td>Vice President, Global Team Leader, Quizartinib and AML franchise</td>
</tr>
<tr>
<td>Yuki Abe</td>
<td>Senior Director, Biologics and Immuno-Oncology laboratories</td>
</tr>
</tbody>
</table>
Contact address regarding this material

Daiichi Sankyo Co., Ltd.
Corporate Communications Department
TEL: +81-3-6225-1126
Email: DaiichiSankyoIR@daiichisankyo.co.jp