Forward-Looking Statement of
Merck & Co., Inc., Kenilworth, NJ, USA

This presentation of Merck & Co., Inc., Kenilworth, N.J., USA (the “company”) includes “forward-looking statements” within the meaning of the safe harbor provisions of the U.S. Private Securities Litigation Reform Act of 1995. These statements are based upon the current beliefs and expectations of the company’s management and are subject to significant risks and uncertainties. There can be no guarantees with respect to pipeline products that the products will receive the necessary regulatory approvals or that they will prove to be commercially successful. If underlying assumptions prove inaccurate or risks or uncertainties materialize, actual results may differ materially from those set forth in the forward-looking statements.

Risks and uncertainties include but are not limited to, general industry conditions and competition; general economic factors, including interest rate and currency exchange rate fluctuations; the impact of pharmaceutical industry regulation and health care legislation in the United States and internationally; global trends toward health care cost containment; technological advances, new products and patents attained by competitors; challenges inherent in new product development, including obtaining regulatory approval; the company’s ability to accurately predict future market conditions; manufacturing difficulties or delays; financial instability of international economies and sovereign risk; dependence on the effectiveness of the company’s patents and other protections for innovative products; and the exposure to litigation, including patent litigation, and/or regulatory actions.

The company undertakes no obligation to publicly update any forward-looking statement, whether as a result of new information, future events or otherwise. Additional factors that could cause results to differ materially from those described in the forward-looking statements can be found in the company’s 2017 Annual Report on Form 10-K and the company’s other filings with the Securities and Exchange Commission (SEC) available at the SEC’s Internet site (www.sec.gov).
A LEADER IN DELIVERING BREAKTHROUGH APPROACHES THAT EXTEND AND IMPROVE THE LIVES OF PEOPLE WITH CANCER

MERCK ONCOLOGY

Establish KEYTRUDA as **foundational treatment** in monotherapy and in combination across multiple tumor types and stages of disease

**Explore combinations** and other novel agents to broaden our portfolio in an effort to reach more patients

**Identify patients** most likely to benefit through evaluation of **biomarkers**

Advance internal pipeline and pursue **strategic collaborations** and acquisitions to expand oncology portfolio
ASCO: BREADTH OF DATA
FROM EXPANSIVE CLINICAL PROGRAM

25+ TUMOR TYPES
140 ABSTRACTS
ACCEPTED FROM OUR BROAD ONCOLOGY PORTFOLIO

- LUNG
- RENAL CELL
- PROSTATE
- HEAD AND NECK
- MELANOMA
- CERVICAL
- MERKEL CELL
- ENDOMETRIAL
- ESOPHAGEAL
- OVARIAN

MERCK
INVENTING FOR LIFE
KEYNOTE-407
Randomized, double-blind, placebo controlled, Phase 3 study in patients with metastatic squamous NSCLC

KEYNOTE-042
Randomized, open-label Phase 3 study in patients with locally advanced or metastatic PD-L1 positive (TPS > 1%) NSCLC

KEYNOTE-021G
Multicenter, open-label, Phase 1/2 multi-cohort study in patients with metastatic, nonsquamous NSCLC
KEYNOTE-407 DEMONSTRATES SIGNIFICANT IMPROVEMENT IN OS

KEYTRUDA is the first immunotherapy in combination with chemotherapy to significantly extend survival in 1L squamous NSCLC patients

HR = .64 [95% CI, 0.49-0.85]

KEYTRUDA REDUCED RISK OF DEATH BY 36% COMPARED TO CHEMO ALONE

Data cutoff date: Apr 3, 2018.
**KEYNOTE-407**

**OS BENEFIT ACROSS ALL PD-L1 SUBGROUPS**

<table>
<thead>
<tr>
<th>TPS &lt;1%</th>
<th>Events</th>
<th>HR (95% CI)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pembro + Chemo</td>
<td>30.5%</td>
<td>0.61 (0.38-0.98)</td>
</tr>
<tr>
<td>Placebo + Chemo</td>
<td>44.4%</td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>TPS 1-49%</th>
<th>Events</th>
<th>HR (95% CI)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pembro + Chemo</td>
<td>30.1%</td>
<td>0.57 (0.36-0.90)</td>
</tr>
<tr>
<td>Placebo + Chemo</td>
<td>43.3%</td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>TPS ≥50%</th>
<th>Events</th>
<th>HR (95% CI)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pembro + Chemo</td>
<td>31.5%</td>
<td>0.64 (0.37-1.10)</td>
</tr>
<tr>
<td>Placebo + Chemo</td>
<td>41.1%</td>
<td></td>
</tr>
</tbody>
</table>

Data cutoff date: Apr 3, 2018.
KEYNOTE-189 (AACR 2018)
OS BENEFIT ACROSS ALL PD-L1 SUBGROUPS

OVERALL SURVIVAL IS THE GOLD STANDARD
SETS THE BAR FOR FUTURE TRIALS IN 1L NSQ NSCLC

TPS <1%

- Events: Pembro/Pem/Plat = 38.6%, Placebo/Pem/Plat = 55.6%
- HR: Pembro/Pem/Plat = 0.59 (0.38-0.92), Placebo/Pem/Plat = 0.59 (0.34-0.90)
- P-value: Pembro/Pem/Plat = 0.0095, Placebo/Pem/Plat = 0.0081

TPS 1-49%

- Events: Pembro/Pem/Plat = 28.9%, Placebo/Pem/Plat = 48.3%
- HR: Pembro/Pem/Plat = 0.55 (0.34-0.90), Placebo/Pem/Plat = 0.55 (0.26-0.68)
- P-value: Pembro/Pem/Plat = 0.0081, Placebo/Pem/Plat = 0.0001

TPS ≥50%

- Events: Pembro/Pem/Plat = 25.8%, Placebo/Pem/Plat = 48.3%
- HR: Pembro/Pem/Plat = 0.42 (0.26-0.68), Placebo/Pem/Plat = 0.42 (0.26-0.68)
- P-value: Pembro/Pem/Plat = 0.0001, Placebo/Pem/Plat = 0.0001

*Nominal and one-sided. Data cutoff date: Nov 8, 2017.
KEYNOTE-042
PHASE 3 TRIAL STUDYING KEYTRUDA IN METASTATIC NONSQ AND SQ NSCLC AT TPS > 1%

**Significant Improvement in Overall Survival in Patients with PD-L1 ≥1%**

**Entire study population with TPS ≥ 1%**

**HR=0.81**

[95% CI, 0.71-0.93]

**Median (95% CI)**

- Pembrolizumab: 16.7 mo (13.9-19.7)
- Chemotherapy: 12.1 mo (11.3-13.3)

**OS, %**

<table>
<thead>
<tr>
<th>Months</th>
<th>No. at Risk</th>
<th>Pembrolizumab</th>
<th>Chemotherapy</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>637</td>
<td>463</td>
<td>438</td>
</tr>
<tr>
<td>6</td>
<td>637</td>
<td>365</td>
<td>316</td>
</tr>
<tr>
<td>12</td>
<td>214</td>
<td>166</td>
<td>106</td>
</tr>
<tr>
<td>18</td>
<td>35</td>
<td>24</td>
<td>16</td>
</tr>
<tr>
<td>24</td>
<td>2</td>
<td>1</td>
<td>0</td>
</tr>
<tr>
<td>30</td>
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<td>36</td>
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<td>0</td>
</tr>
<tr>
<td>42</td>
<td>0</td>
<td>0</td>
<td>0</td>
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</tbody>
</table>

**Events**

- Pembrolizumab: 371
- Chemotherapy: 438
KEYNOTE-042
OS BENEFIT IN PATIENTS WITH ANY LEVEL OF PD-L1 EXPRESSION

TPS ≥ 1%

TPS ≥ 20%

TPS ≥ 50%

<table>
<thead>
<tr>
<th>Events</th>
<th>HR (95% CI)</th>
<th>P</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pembrolizumab</td>
<td>371</td>
<td>0.81 (0.71-0.93)</td>
</tr>
<tr>
<td>Chemotherapy</td>
<td>438</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Events</th>
<th>HR (95% CI)</th>
<th>P</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pembrolizumab</td>
<td>230</td>
<td>0.77 (0.64-0.92)</td>
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<tr>
<td>Chemotherapy</td>
<td>266</td>
<td></td>
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</table>

<table>
<thead>
<tr>
<th>Events</th>
<th>HR (95% CI)</th>
<th>P</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pembrolizumab</td>
<td>157</td>
<td>0.69 (0.56-0.85)</td>
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<tr>
<td>Chemotherapy</td>
<td>199</td>
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</table>
LONG-TERM FOLLOW UP DEMONSTRATES CONTINUED DURABILITY OF CHEMO-COMBO

KEYNOTE-021G
24-MONTH OS DATA

Overall Survival, %

<table>
<thead>
<tr>
<th>Time, months</th>
<th>0</th>
<th>3</th>
<th>6</th>
<th>9</th>
<th>12</th>
<th>15</th>
<th>18</th>
<th>21</th>
<th>24</th>
<th>27</th>
<th>30</th>
<th>33</th>
<th>36</th>
</tr>
</thead>
<tbody>
<tr>
<td>No. at risk</td>
<td>60</td>
<td>57</td>
<td>55</td>
<td>51</td>
<td>46</td>
<td>44</td>
<td>42</td>
<td>41</td>
<td>31</td>
<td>18</td>
<td>10</td>
<td>63</td>
<td>58</td>
</tr>
</tbody>
</table>

Events | Median, mo (95% CI) | HR (95% CI) | P   |
-------|---------------------|-------------|-----|
Pembrolizumab +PC | 22/60 | NR (24.5-NR) | 0.56 | 0.01508 |
PC alone     | 35/63 | 21.1 (14.9-NR) | (0.32-0.95) |
LEADERS IN FIRST-LINE LUNG

EGFR / ALK

PD-L1 < 1%

PD-L1 1-49%

PD-L1 > 50%

= Squamous

= Nonsquamous

SPANNING 80% OF NSCLC PATIENTS
EXPANDING FOOTPRINT IN LUNG
BEYOND METASTATIC NSCLC

REACHING EVEN MORE TYPES OF LUNG CANCER

STAGE IV NSCLC
KEYNOTE-001, 010, 024, 189, 042, 407

STAGE III NSCLC
KEYNOTE-091, 671, HOOSIER STUDY

STAGE I - III

SCLC

SCLC
KEYNOTE-158 and -604

NSCLC
KEYNOTE-146
Multi-center, open-label
Phase 1b/2 study of renal cell carcinoma
as second-line combination therapy
(lenvatinib + pembrolizumab)

STUDY 08
Randomized, double-blinded, multi-center
Phase 2 trial, comparing LYNPARZA in
combination with abiraterone to abiraterone
monotherapy alone in patients with previously
 treated mCRPC
KEYNOTE-146
LENVIMA + KEYTRUDA FOR TREATMENT OF PATIENTS WITH aRCC

ALMOST ALL PATIENTS (N=29) EXPERIENCED TUMOR REDUCTION FROM BASELINE

DEMONSTRATED ANTITUMOR ACTIVITY AS 2L RCC THERAPY WITH ORR 70.0%

PHASE 3 TRIALS IN 1L RCC UNDER WAY (KN-581 & KN-426)
STUDY 08
LYNPARZA + ABIRATERONE IN PATIENTS WITH PREVIOUSLY TREATED mCRPC

FIRST PARP TO DEMONSTRATE ACTIVITY IN COMBINATION WITH STANDARD OF CARE IN PROSTATE CANCER
WHAT TO WATCH: NEXT 18 MONTHS*

SELECT TRIAL READ-OUTS

November 2018
- NEOADJ/ADJ – MONO/COMBO TNBC: KN–522

December 2018
- 1L H&N MONO/COMBO: KN–048
- 2L+ TNBC: KN–119
- cHL: KN–204
- NMIBC BLADDER: KN–057

February 2019
- 2L+ HCC: KN–240
- 1L GASTRIC MONO/COMBO: KN–062
- cHL: KN–204

June 2019
- 1L BLADDER – MONO/COMBO: KN–361

October 2019
- 1L RCC COMBO: KN–581

December 2019
- 1L TNBC: KN–355

Mid-2018
- BRCAm 1L OVARIAN (LYNPARZA) SOLO–1

*Dates based on clinicaltrials.gov as of 6/4/18: All trials are event-driven

FDA ACTION DATES 2018

JUNE 28
Cervical KN–158

JULY 3
PMBCL KN–173

AUG 24
HCC (LENVIMA)

DEC 28
2L H&N KN–040

SEPT 23
1L NSCLC KN–189