Executive Summary: Telefónica Deutschland

VISION
We want to become the German Mobile Customer and Digital Champion by leveraging growth opportunities with the biggest mobile customer base and by entering the next level of digitalisation

STRATEGIC PRIORITIES
- Lean Organisation
- Digitalisation
- Superior shareholder return

OPERATIONAL AND FINANCIAL PERFORMANCE
- Telefónica Deutschland showing sustained commercial performance and financial momentum in a dynamic competitive, yet rational environment
- Underlying$^1$ revenue +2.1% year-on-year in 9M 2019 with focus on data monetisation and solid demand for handsets
- Underlying$^2$ OIBDA (as per IAS 17) +0.8% year-on-year YTD Sep 2019, reflecting ongoing market & transformation invest
- Solid B/S, liquidity position and FCF generation ability

CAPEX AND EFFICIENCY
- Strong spectrum position maintained post 2019 auction; deferred payment significantly enhance financial flexibility with interest-free instalments until 2030
- Capex invest remains focused on customer experience with the LTE roll-out in full swing to fulfil coverage obligations

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$^1$ Excluding the negative impact from regulatory changes; mainly driven by the MTR regulation (mobile termination rate cut to EURc 0.95 per minute as of 1 Dec 2018) and the international call regulation within the EU that kicked-in as of 15 May 2019

$^2$ Adjusted for exceptional effects and excluding the negative impact from regulatory changes; mainly usage elasticity effects from the European roaming regulation and the international call regulation within the EU
Telefónica Deutschland at a glance

1 company - 4 years

- Largest and fastest mobile merger in the West
- One of the largest players in German mobile market by customers
- Synergy case upgraded to EUR 900 m will be delivered

>30% OIBDA growth over 4 years

>30% Headcount harmonised in 3 years

>30% Shop reduction in 3 years

>25m Customers migrated to one IT stack in 2016

>30% Network sites to be consolidated by 2019

O₂ Free

3G Unlimited
4G Big bucket portfolio

### Financials

<table>
<thead>
<tr>
<th>Metric</th>
<th>2018</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>Revenue</td>
<td>EUR 7,320 m</td>
<td>EUR 7,308 m</td>
</tr>
<tr>
<td>MSR</td>
<td>EUR 5,267 m</td>
<td>EUR 5,260 m</td>
</tr>
<tr>
<td>OIBDA</td>
<td>EUR 1,884 m</td>
<td>EUR 1,884 m</td>
</tr>
<tr>
<td>Capex</td>
<td>EUR 958 m</td>
<td>EUR 958 m</td>
</tr>
<tr>
<td>Accesses</td>
<td>47 m</td>
<td>47 m</td>
</tr>
</tbody>
</table>

### Market Cap

- Fitch Rating: BBB
- Listed: MDAX, TecDAX

### Employees

- >9,000

### Shareholder Structure

- Telefónica Germany Holdings Ltd.: 30.8%
- Freefloat: 69.2%

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1 Excluding negative impact from regulatory changes; mainly driven by the MTR regulation (mobile termination rate cut to EURc 0.95 per minute as of 1 Dec 2018) and the international call regulation within the EU that kicked-in as of 15 May 2019

2 Excluding additions from capitalised right-of-use assets (as of 1 January 2019) respective excluding additions from capitalised finance leases (till 31 December 2018)

All figures FY 2018

All figures 30.06.2019
Macro outlook shows German economy will remain mostly stable with strong consumer spending to be expected

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### Summary of macro outlook

<table>
<thead>
<tr>
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</tr>
</thead>
<tbody>
<tr>
<td>GDP growth real, %</td>
<td>2.2%</td>
<td>2.5%</td>
<td>1.5%</td>
<td>0.8%</td>
<td>1.4%</td>
<td>1.5%</td>
<td>1.4%</td>
</tr>
<tr>
<td>CPI, annual change</td>
<td>0.4%</td>
<td>1.7%</td>
<td>1.9%</td>
<td>1.3%</td>
<td>1.7%</td>
<td>1.9%</td>
<td>2.2%</td>
</tr>
<tr>
<td>Population % change</td>
<td>-0.05%</td>
<td></td>
<td></td>
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</tr>
</tbody>
</table>

### Political situation

- *Christian Democratic Union (CDU and CSU) and Social Democrats (SPD) continue to govern nationally as part of a longstanding Grand Coalition* led by chancellor Angela Merkel
- Merkel’s potential successor still uncertain; upcoming government elections in 2021

### Key drivers and outlook

- Germany’s *economy is in full swing*, no major changes expected
- *Low inflation rate (1.3%)*, no major risk expected
- Stable *low unemployment* rate at 4.9%
- *Price regulations* like Mobile Termination Rate, Roam Like Home and Intra EU Calls decrease revenues, which need to be compensated

### Read across for Telefónica Deutschland

- *Strong purchasing power* and low inflation rate positively impacting overall business
- Latest *focus of German government* with regards to mobile infrastructure gives window of opportunity to create a regulatory framework which enables us to build the necessary infrastructure at a lesser cost (e.g. through participation in state aid programme and/or other less cost-intensive co-operations)
- *Risk of 4th enterant* in regulatory framework
German telco market is expected to continue to grow service revenues

### Key market trends

**MOBILE MARKET DEVELOPMENT**
- German mobile market outlook (ex. reg. effects) **slightly growing**, backed by strong macro environment with attractive growth opportunities (mobile data, ADA³, IoT)
- **Significant regulation impact** resulting from MTR cuts and to a limited extent intra-EU call price caps
- **Willingness to spend is increasing with ARPU-up opportunities** from increasing penetration of data tariffs and LTE and increasing migration of customer to high-value tariffs (improved tariff mix)
- Telefónica Deutschland ranks **#2 in MSR market share**

### FIXED MARKET DEVELOPMENT
- German fixed market shows a moderate positive development driven by continued infrastructure roll-outs in rural regions and increasing number of households
- Vodafone / Liberty merger expected to have **no major impact on growth trajectory**

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**Market share**

<table>
<thead>
<tr>
<th>Year</th>
<th>TEF DE – mobile service revenue market share¹</th>
<th>MSR market share</th>
</tr>
</thead>
<tbody>
<tr>
<td>2016A</td>
<td>30%</td>
<td></td>
</tr>
<tr>
<td>2017A</td>
<td>29%</td>
<td></td>
</tr>
<tr>
<td>2018A</td>
<td>32%</td>
<td></td>
</tr>
</tbody>
</table>

**Market mobile service revenue EUR m**

<table>
<thead>
<tr>
<th>Year</th>
<th>TEF DE – mobile service revenue EUR m</th>
</tr>
</thead>
<tbody>
<tr>
<td>2016A</td>
<td>18,183</td>
</tr>
<tr>
<td>2017A</td>
<td>18,085</td>
</tr>
<tr>
<td>2018A</td>
<td>16,516</td>
</tr>
</tbody>
</table>

**Mobile accesses**

<table>
<thead>
<tr>
<th>Access Type</th>
<th>2017A</th>
<th>2018A</th>
</tr>
</thead>
<tbody>
<tr>
<td>Telefónica</td>
<td>36.7%</td>
<td></td>
</tr>
<tr>
<td>T-Mobile</td>
<td>37.9%</td>
<td></td>
</tr>
<tr>
<td>Other</td>
<td>25.4%</td>
<td></td>
</tr>
</tbody>
</table>

**Fixed BB accesses**

<table>
<thead>
<tr>
<th>Access Type</th>
<th>2017A</th>
<th>2018A</th>
</tr>
</thead>
<tbody>
<tr>
<td>Telefónica</td>
<td>39%</td>
<td></td>
</tr>
<tr>
<td>T-Mobile</td>
<td>22%</td>
<td>6%</td>
</tr>
<tr>
<td>Other</td>
<td>11%</td>
<td>15%</td>
</tr>
</tbody>
</table>

### Notes

1. Public information/analyst reports, 2018 figures impacted by IFRS change
2. Public information/analyst reports, internal estimates
3. Advanced Data Analytics
Telefónica Deutschland is **well positioned to lead** one of the most attractive telco markets

**MARKET TRENDS**

German market with significant further growth potential

**Mobile data usage in Europe**

<table>
<thead>
<tr>
<th>Country</th>
<th>Usage (GB/month per connection)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Finland</td>
<td>19.8</td>
</tr>
<tr>
<td>Austria</td>
<td>9.6</td>
</tr>
<tr>
<td>Sweden</td>
<td>6.1</td>
</tr>
<tr>
<td>France</td>
<td>5.4</td>
</tr>
<tr>
<td>Switzerland</td>
<td>5.0</td>
</tr>
<tr>
<td>UK</td>
<td>2.8</td>
</tr>
<tr>
<td>Germany</td>
<td>1.9</td>
</tr>
</tbody>
</table>

- Germany still a European **laggard in terms of customer data usage**
- Further opportunities from growing LTE adoption

**Mobile data traffic in Germany**

Annual volume of mobile data traffic in million GB

- **CAGR 2017-2020**
  - **5,097**
  - **2,381**
  - **+51%**

**Preparation for 5G opportunities**

**Risk of 4th entrant in the German market**

**Soft convergence trend**

**TV**

**Pre- to Postpaid migration**

**Advanced Data Analytics & IoT**

**Music & video streaming** as usage drivers
- Average usage of 3 GB/month for LTE customers

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1. Analysys Mason "Western Europe telecoms market trends and forecasts 2018–2023", 29.10.2018
Competitive advantages allow us to leverage growth opportunities on our way to become the **German Mobile Customer & Digital Champion**

We have completed our **network consolidation successfully** and are ready to deploy 5G fast and efficiently

Across all segments with largest owned **customer base of ~35 m**

Transformation programme **Digital4Growth (D4G)** places the customer at the centre of our actions

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1. We want to become Germany’s largest and most modern mobile network and build the best network for customer experience until 2022
Becoming the Mobile Customer & Digital Champion: All-round infrastructure player confirmed

**MOBILE INFRASTRUCTURE**

- **4G** ✔️
- **5G** ✔️

**FIXED NET INFRASTRUCTURE**

- **VDSL** ✔️
- **FttH** ✔️
- **Cable** ✔️

> 7,000 new LTE sites by Oct 2019 on track for FY 2019 target of 10,000

**Driving innovation in 5G**
Establishing the world's first 5G network for automobile production in Mercedes-Benz Cars “Factory 56”

**Long-term FttH and VDSL access through Deutsche Telekom**

**Exclusive cable wholesale access**
to Vodafone’s and Tele Columbus’ cable network in Germany; enhancing infrastructure footprint to give customers choice: Triple play offers via fixed & cable
We have been successfully driving the **3 fundamental pillars** of our business in HY1 2019: **Quality, trading and financials**

**QUALITY**

**WINNER**

Stores
National store operators

**WINNER**

Partner-Stores
Franchise operators

**VERY GOOD**

Fixed Net
Fixed Net big players

**VERY GOOD**

Fixed Net
Fixed Net offers

**GOOD**

Service Hotline
Telcos

4.5/5

O2 TV
Computer Bild User Test

All awards from 2019

**TRADING**

**Postpaid**
23.3m customers

+1m
Net adds

All figures from Jan-Sep 2019

**Churn**
vs. -18.0% (FY’17)

-15.7%
Annualised

**Fixed**
2.2m customers

+114k
Net adds

**FINANCIALS**

Revenue & MSR on track

OIBDA on track

Capex on track

All references to the results Jan-Sep 2019
Focus on customer experience to generate growth with a portfolio of future-proof products, services and solutions for all customer groups.
Deep-dive: Overview of Telefónica Deutschland’s relationship with 1&1 Drillisch

2014
Drillisch is a limited service provider¹
2m customers, EUR 290 m operating revenue, EUR 85 m OIBDA

2014 JULY
MBA MVNO - remedy signed
• 20% obligatory plus 10% optional network capacity, minimum duration 5 years
• One-side contract prolongation possible for 2x 5 years

2014 OCT
Telefónica Germany and E-Plus finalise merger

2015 JUNE
Start MBA MVNO

2017 SEPT
Merger 1&1 and Drillisch

2018 DEC
1&1 Drillisch continues to grow¹
13.7 m customers, EUR 912 m operating revenue, EUR 168.5 m OIBDA

2019 JAN
1&1 Drillisch registers for 5G spectrum auction
20% glide path achieved

2019 JUNE
5G spectrum auction finalised
Telefónica Deutschland acquires 2 x 10MHz (2.0 GHz band), 7 x 10Mhz (3.6 GHz band) for a total of EUR 1.43 bn
1&1 Drillisch buys 2 x 10MHz (2 GHz band); 5 x 10 MHz (3.6 GHz band) of spectrum for a total of EUR 1.07 bn

2019 OCT
Independent expert intends to confirm MBA MVNO pricing for the period from Sep 2017; outcome for further reviews for periods from July 2018 onwards expected to resolve in 2020

2019 DEC
Decision on prolongation MBA MVNO

2020 JUNE
End of first season

¹ Source: annual report 1&1 Drillisch 2014 & 2018
**SCENARIO 1:**
Continuation of MBA MVNO

**EU-approved capacity glide path**

- Commitment utilised capacity
  - 0%
  - 20%
  - 30%
  - Today

**Four levers for revenue growth**
- Exponential data growth
- Capacity of 20% and potential upgrade to 30%
- Price-tiering based on speed
- Price-tiering based on technology

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**SCENARIO 2:**
MNO remedy – gradual transition

**Operating Revenue**
EUR 7,320 m

- Handset
- Fixed
- MSR: Own brands
- MSR: Other partners
- MSR: MBA MVNO / PO
- NR revenues
- MBA revenues
- Own & other partner revenues

**Gradual transition of revenue streams**
- **Commercial terms** derived from MBA MVNO
- **Sublease spectrum** for 2G/3G/4G national roaming
- MVNO and MNO only for a **transition period**
- Gradual ramp-up of **other partner & own business** to mitigate

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**Post German spectrum auction** no short- to mid-term impact expected; long-term mitigation via own & other partner business
Our transformation programme ‘Digital4Growth’ is designed to transform our company holistically placing the **customer at the centre of our actions**

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**Digital4Growth**

<table>
<thead>
<tr>
<th>Year</th>
<th>2019</th>
<th>2020</th>
<th>2021</th>
<th>2022</th>
</tr>
</thead>
<tbody>
<tr>
<td>EUR</td>
<td>~40m</td>
<td></td>
<td></td>
<td>~600m</td>
</tr>
</tbody>
</table>

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### Transformation workstreams

**Revenue-related gains**

- Portfolio adjustments & ARPU-up
- Digital/online sales and omnichannel initiatives
- Churn analytics
- eSIM
- Advanced Data Analytics /IoT

**Cost-related gains**

- Customer Service efficiency initiatives
  - Channel mix & shop optimisation
  - Integration fixed bb customer service system
  - Robotics: Process optimisation

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**Simpler**

**Faster**

**Better**
**Financial Performance:** Strong trading & financial momentum in January to September 2019 with revenue further improving.

### HISTORICAL DEVELOPMENT

- **OIBDA growth** driven by synergies capture and new transformation activities (Digital 4 Growth).

### Jan - Sep 2019 PERFORMANCE

- Strong trading momentum in O₂ and partner brands; LTE customer base up +21.8% y-o-y to 20.9 million.
- Demand for O₂ Free continues to drive data usage growth with a CAGR of 50%.
- Underlying\(^1\) revenue trends supported by sustained demand for handsets & strong traction of O₂ Free portfolio.
- Reported MSR up +1.6% in Q3’19, and thus again in positive territory after the turnaround in Q2’19; underlying\(^1\) MSR trends improve to +2.7% y-o-y in Q3.
- OIBDA reflects ongoing market and transformation invest; EUR ~60 m benefit from roll-over synergies and transformation.
- Capex phasing supports pace of LTE roll-out; mid-term expectations unchanged at approx. EUR 1 bn.

#### TEF_Total

<table>
<thead>
<tr>
<th></th>
<th>2016</th>
<th>2017</th>
<th>2018 (IFRS15)</th>
<th>2019 (IAS 17)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Operating Revenue</strong></td>
<td>7,503</td>
<td>7,296</td>
<td>7,320</td>
<td>5,429</td>
</tr>
<tr>
<td><strong>Mobile Service Revenue</strong></td>
<td>5,437</td>
<td>5,287</td>
<td>5,267</td>
<td>3,960</td>
</tr>
<tr>
<td><strong>OIBDA adjusted for exceptional effects</strong></td>
<td>1,793</td>
<td>1,840</td>
<td>1,884</td>
<td>1,359</td>
</tr>
<tr>
<td><strong>CAPEX</strong></td>
<td>1,102</td>
<td>950</td>
<td>966</td>
<td>782</td>
</tr>
<tr>
<td><strong>Operating Cash Flow(^2)</strong></td>
<td>967</td>
<td>835</td>
<td>831</td>
<td>529</td>
</tr>
<tr>
<td><strong>Mobile Postpaid Net Adds</strong></td>
<td>1,453</td>
<td>738</td>
<td>1,002</td>
<td>999</td>
</tr>
<tr>
<td><strong>DSL Retail Net Adds</strong></td>
<td>6</td>
<td>(32)</td>
<td>8</td>
<td>114</td>
</tr>
</tbody>
</table>

\(^1\) y-o-y comparison based on IAS17 accounting standards for 2018 and 2019; or details please refer to materials of the Q3 2019 results release

\(^2\) OIBDA – Capex
Operational and financial trends remain strong

1 Excluding the negative impact from regulatory changes (mainly driven by the mobile termination rate cut to EURc 0.95 per minute as of 1 Dec 2018)
2 Mobile service revenue include base fees and fees paid by our customers for the usage of voice, sms and mobile data services. Also, access and interconnection fees as well as other charges levied on our partners for the use of our network are included.
3 Exceptional effects were EUR 1.8 million of restructuring expenses in the period June to September 2019 (EUR 8.4 million based on IAS 17). The difference between restructuring charges under IAS 17 and IFRS 16 is due to the fact that certain IAS 17 operating lease commitments require the recognition of provisions, whereas those are recognised as lease liabilities under IFRS 16. Regulatory effects amounted to EUR 10.3 million in the period June to September 2019.
4 Excluding additions from capitalised right-of-use assets (as of 1 January 2019) and excluding additions from capitalised finance leases (till 31 December 2018)
### Outlook 2019: Building on our 2018 achievements and a solid 9M performance as we move from integration to transformation

<table>
<thead>
<tr>
<th>Actuals FY’18 (IFRS15)</th>
<th>Outlook² FY’19 (IFRS15)</th>
<th>9M 2019</th>
<th>Mid-term expectations</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Revenue</strong></td>
<td>7,320 FY ’18</td>
<td>+2.1% yoy</td>
<td>Revenue growth in line with German market; capturing market share in IoT</td>
</tr>
<tr>
<td><strong>OIBDA¹</strong></td>
<td>1,884 FY ’18</td>
<td>+0.8% yoy</td>
<td>Ongoing margin improvement supported by growth centric transformation case (EUR ~600 m gross OIBDA 2019/22)</td>
</tr>
<tr>
<td><strong>C/S²</strong></td>
<td>13.2%</td>
<td>14.4% yoy</td>
<td>Keeping Capex level stable at around EUR 1 bn</td>
</tr>
</tbody>
</table>

- Underlying revenue reflect tailwinds from ARPU-up strategy supported by new O₂ Free tariffs which help to counteract ongoing legacy base management topics, while we continue to leverage our many long-term partnership contracts
- OIBDA benefits from integration and transformation savings, partly offset by commercial and transformation invest; transformation savings to gradually ramp-up throughout 2019 and over the course of our four year D4G programme
- Re-iterating midterm expectations: Expecting to grow with the market, strong confidence in our ability to grow FCF and continue to support a high dividend pay-out ratio to FCF

¹ Exceptional effects such as restructuring costs or the sale of assets are excluded
² The effects from the implementation of IFRS 16 as of 1 January 2016 are not reflected in the financial outlook
**Strategic initiatives:** Telefónica Deutschland’s strategy provides superior growth & profitability

### GROWTH
- Exploration of new **5G business opportunities** (e.g. ‘Factory 56’ with Mercedes-Benz)
- Continued **data monetisation in B2C** from evolving O2 and Blau portfolios, focusing on customer experience
- **All-round infrastructure player** (mobile, VDSL, cable), FWA optionality
- **Leverage partner business** to maximise value add
- Transformation of **B2B business** to exploit market opportunities in SME segment

### EFFICIENCY
- Becoming German ‘**Mobile Customer & Digital Champion**’ with our transformation programme ‘**Digital4Growth**’, focusing on customer experience and digitalisation
- Ongoing **invest** into **future-proof network & IT platforms** to increase efficiency
- Opportunity of **mobile network sharing**
- **Ambition to switch off 3G** by 2022
- **Lean & agile organisation** to execute in a fast and efficient manner

### RETURNS
- Leverage Germanys **largest owned customer base** (35m customers)
- **ARPU-up and Churn-down**, through multi-brand and multi-channel service landscape
- **Transformation case** presented at CMD in Feb 2018 with upfront invest and gradual ramp-up up of savings to **EUR ~600 m gross OIBDA contribution** between 2019-22
- Open for **network sharing** especially in 5G environment
- Sustained OIBDA growth and efficient CAPEX spend supports **solid FCF trajectory** and dividend