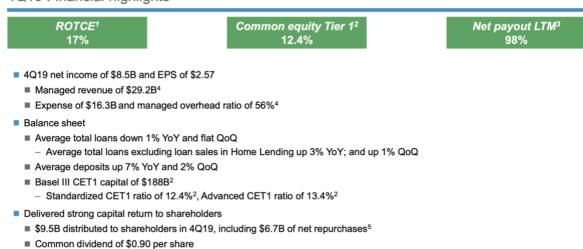
#### JPMorgan Chase 4Q19

The earnings seasons starts well with JPMorgan Chase having the largest annual profit ever for a bank in history.

Let's have a look at the highlights and then, we will go into deeper details.

#### 4Q19 Financial highlights



These numbers are much better than Wall Street was predicting.

- Revenue (adjusted): \$29.2 billion vs \$27.9 billion expected.
- Earnings per share (adjusted): \$2.57 vs \$2.36 per share expected JPMorgan's net income for the fourth quarter came in at \$8.5 billion, up 21%. Even amid widespread economic uncertainty and market volatility, the bank posted record full-year net income of \$36.4 billion, or \$10.72 per share making 2019 its most profitable year ever.

If we look a little deeper, we can see that all the different segments have been doing great except for the falls in loans in the consumer and commercial banking business.

## FOURTH-QUARTER 2019 RESULTS<sup>5</sup>

# Firmwide Metrics

- Reported revenue of \$28.3 billion; managed revenue of \$29.2 billion¹
- ROE of 14%; ROTCE<sup>1</sup> of 17%
- Average total loans down 1%, or up 3% excluding the impact of loan sales in Home Lending

## **CCB**

4Q19 ROE 31% 2019 ROE 31%

- Average loans down 6%; Home Lending loans down 17% impacted by loan sales; credit card loans up 8%
- Client investment assets up 27%; average deposits up 5%
- Credit card sales volume<sup>6</sup> up 10%; merchant processing volume up 7%

### CIB

4Q19 ROE 14% 2019 ROE 14%

- #1 Global Investment Banking fees with 9.0% wallet share for the year, up 40 bps
- Total Markets revenue of \$5.0 billion, up 56%

#### CB

4Q19 ROE 16% 2019 ROE 17%

- Gross Investment Banking revenue of \$634 million, up 5%
- Average loans up 1%; deposits up 8%

## **AWM**

4Q19 ROE 29% 2019 ROE 26%

- Assets under management (AUM) of \$2.4 trillion, up 19%
- Average loans up 8%; deposits up 8%

#### FORTRESS PRINCIPLES

- Book value per share of \$75.98, up 8%; tangible book value per share of \$60.98, up 8%
- Basel III common equity Tier 1 capital<sup>2</sup> of \$188 billion and ratio<sup>2</sup> of 12.4%
- Firm supplementary leverage ratio of 6.3%

#### OPERATING LEVERAGE

 4Q19 reported expense of \$16.3 billion; reported overhead ratio of 58%; managed overhead ratio of 56%

#### CAPITAL DISTRIBUTED

- \$9.5 billion<sup>4</sup> distributed to shareholders in 4Q19
  - \$6.7 billion of net repurchases and common dividend of \$0.90 per share

#### SUPPORTED CONSUMERS, BUSINESSES & COMMUNITIES

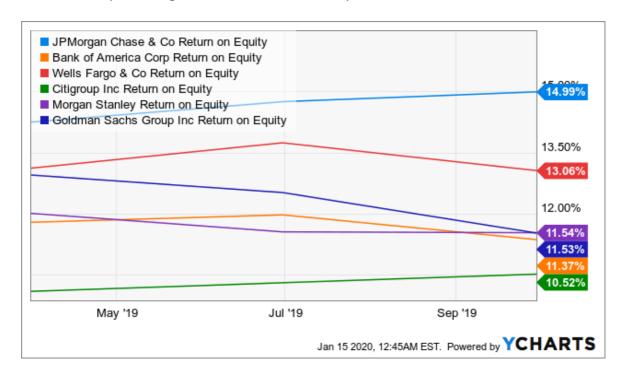
- **\$2.3 trillion** of credit and capital<sup>7</sup> raised in 2019
  - \$262 billion of credit for consumers
  - \$33 billion of credit for U.S. small businesses
  - \$863 billion of credit for corporations
  - \$1.0 trillion of capital raised for corporate clients and non-U.S. government entities
  - \$79 billion of credit and capital raised for nonprofit and U.S. government entities, including states, municipalities, hospitals and universities

Let's now look at the full results

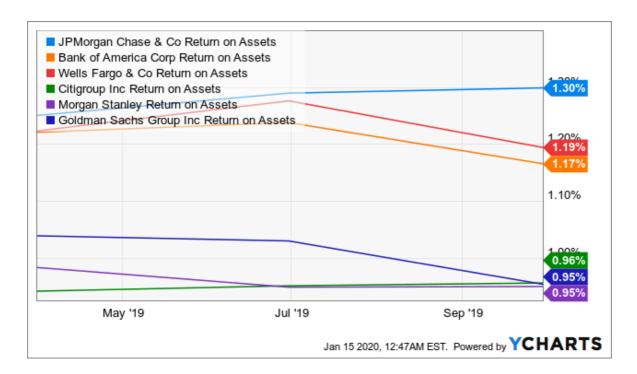
					QU	ARTE	RLY TRENDS								<b>FULL YEAR</b>	
										4Q19 CI	nange	_				2019 Change
SELECTED INCOME STATEMENT DATA	4Q19	15		3Q19	2Q19		1Q19		4Q18	3Q19	4Q18		2019		2018	2018
Reported Basis																
Total net revenue	\$ 28,3		\$	29,341	\$ 28,832	S	29,123	\$	26,109	(3)%	9%	\$	115,627		\$ 109,029	69
Total noninterest expense	16,3	139		16,422	16,341		16,395		15,720	(1)	4		65,497		63,394	3
Pre-provision profit	11,9			12,919	12,491		12,728		10,389	(7)	15		50,130		45,635	10
Provision for credit losses	1,4	27		1,514	1,149		1,495		1,548	(6)	(8)		5,585		4,871	15
NET INCOME	8,8	20		9,080	9,652		9,179		7,066	(6)	21		36,431		32,474	12
Managed Basis (a)																
Total net revenue	29,2	11		30,064	29,566		29,851		26,804	(3)	9		118,692		111,534	6
Total noninterest expense	16,3	139		16,422	16,341		16,395		15,720	(1)	4		65,497		63,394	3
Pre-provision profit	12,8	72		13,642	13,225		13,456		11,084	(6)	16		53,195		48,140	- 11
Provision for credit losses	1,4	27		1,514	1,149		1,495		1,548	(6)	(8)		5,585		4,871	15
NET INCOME	8,8	20		9,080	9,652		9,179		7,066	(6)	21		36,431		32,474	12
EARNINGS PER SHARE DATA																
Net income: Basic	\$ 2	.58	\$	2.69	\$ 2.83	\$	2.65	\$	1.99	(4)	30	\$	10.75		\$ 9.04	19
Diluted	2	.57		2.68	2.82		2.65		1.98	(4)	30		10.72		9.00	19
Average shares: Basic	3,14	0.7		3,198.5	3,250.6		3,298.0		3,335.8	(2)	(6)		3,221.5		3,396.4	(5)
Diluted	3,14	8.5		3,207.2	3,259.7		3,308.2		3,347.3	(2)	(6)		3,230.4		3,414.0	(5)
MARKET AND PER COMMON SHARE DATA																
Market capitalization	\$ 429,9	113	S	369,133	\$ 357,479	S	328,387	S	319,780	16	34	\$	429,913		\$ 319,780	34
Common shares at period-end	3,08			3,136.5	3,197.5		3,244.0		3,275.8	(2)	(6)		3,084.0		3,275.8	(6)
Book value per share	75			75.24	73,88		71.78		70.35	1	8		75.98		70.35	8
Tangible book value per share ("TBVPS") (b)	60			60.48	59.52		57.62		56.33	1	8		60.98		56.33	8
Cash dividends declared per share	0	.90		0.90	0.80		0.80		0.80	-	13		3.40		2.72	25
FINANCIAL RATIOS (c)																
Return on common equity ("ROE")		14%		15%	16%		16%		12%				15%		13%	
Return on tangible common equity ("ROTCE") (b)		17		18	20		19		14				19		17	
Return on assets	1	22		1.30	1.41		1.39		1.06				1.33		1.24	
CAPITAL RATIOS																
Common equity Tier 1 ("CET1") capital ratio (d)		2.4% (e		12.3%	12.2%		12.1%		12.0%				12.4%		12.0%	
Tier 1 capital ratio (d)		4.1 (e		14.1	14.0		13.8		13.7				14.1	(e)	13.7	
Total capital ratio (d)		6.0 (e		15.9	15.8		15.7		15.5				16.0	(e)	15.5	
Tier 1 leverage ratio (d)		7.9 (e		7.9	8.0		8.1		8.1				7.9	(e)	8.1	
Supplementary leverage ratio ("SLR")		6.3 (e	)	6.3	6.4		6.4		6.4				6.3	(e)	6.4	

The first thing to note is the increase in revenues and net income.

The company was able to improve its business. For example, ROE is up by 2% from 13% to 15%. This keeps JPMorgan Chase ahead of its competitors.



Returns on Assets increased as well from 1.24% to 1.33% and once again, JPM is leading.



ROE and ROA are two of the most important metrics to use to value banks. A bank may have trillions of dollars in assets, but they may not always be generating enough profits from them. For example, the Industrial and Commercial Bank of China is the largest bank in the world by AUM, but they have an ROA of only 1.07%.

			QUA	ARTERLY TRENDS					<b>FULL YEAR</b>	
	4Q19	3Q19	2Q19	1Q19	4Q18	4Q19 Ch 3Q19	ange 4Q18	2019	2018	2019 Change 2018
ELECTED BALANCE SHEET DATA (period-end)	4019	3019	2019	1019	4018	3019	4018	2019	2018	2018
otal assets	\$ 2,687,379	\$ 2,764,661	\$ 2,727,379	\$ 2,737,188	\$ 2,622,532	(3)%	2%	\$ 2,687,379	\$ 2,622,532	2
oans:	\$2,007,070	\$2,104,001	42,121,010	\$2,707,100	9 2,022,002	(5)76	2.70	\$ 2,007,070	& E,OEE,OOE	
Consumer, excluding credit card loans	335.040	336,630	352,722	363,914	373.732	-	(10)	335,040	373,732	(10
Credit card loans	168.924	159,571	157.576	150,527	156.632	6	8	168,924	156.632	8
Wholesale loans	455,805	449,017	446,591	441,804	454,190	2	_	455,805	454,190	_
Total Loans	959,769	945,218	956,889	956,245	984,554	2	(3)	959,769	984,554	(3
Core loans (a)	916,144	899,572	908,971	905,943	931,856	2	(2)	916,144	931,856	(2
Core loans (average) (a)	903,707	900,567	905,786	916,567	907,271		_	906,606	885,221	'3
eposits:										
U.S. offices:										
Noninterest-bearing (b)	395.667	393,522	394.237	388,572	386.709	1	2	395,667	386,709	1
Interest-bearing (b)	876,156	844,137	841,397	826,723	813.881	4	8	876,156	813,881	
Non-U.S. offices:										
Noninterest-bearing (b)	20,087	21,455	20,419	21,090	21,459	(6)	(6)	20,087	21,459	
Interest-bearing (b)	270,521	266,147	268,308	257,056	248,617	2	9	270,521	248,617	
Total deposits	1,562,431	1,525,261	1,524,361	1,493,441	1,470,666	2	6	1,562,431	1,470,666	
ng-term debt	291,498	296,472	288,869	290,893	282,031	(2)	3	291,498	282,031	
ommon stockholders' equity	234,337	235,985	236,222	232,844	230,447	(1)	2	234,337	230,447	
tal stockholders' equity	261,330	264,348	263,215	259,837	256,515	(1)	2	261,330	256,515	
ans-to-deposits ratio	61%	62%	63%	64%	67%			61%	67%	
adcount	256,981	257,444	254,983	255,998	256,105	_	_	256,981	256,105	-

Although, we saw a massive increase in market cap this year, assets grew by only 2%. This is already a sign that the stock might be overpriced.

The credit card business has been doing great lately. JPM has taken the advantage of the low interest rates to boost its credit card business. The credit card business also helps customers get into the JPMorgan Chase ecosystem.

The loan to deposit ratio has fallen from 67% to 61%. The loan to deposit ratio is another important number to use to rate the performance of a bank. Loans are assets for banks

while deposits are liabilities. But the bank may not want to have too much loan in relation to deposits as they may have a liquidity problem.

JPMORGAN CHASE & CO.

CONSOLIDATED STATEMENTS OF INCOME
(in millions, except per share and ratio data)

JPMORGAN CHASE & CO.

			QUA	ARTERLY TRENDS					<b>FULL YEAR</b>	
						4Q19 CI	nange			2019 Change
REVENUE	4Q19	3Q19	2Q19	1Q19	4Q18	3Q19	4Q18	2019	2018	2018
Investment banking fees	\$ 1,843	\$ 1,967	\$ 1,851	\$ 1,840	\$ 1,814	(6)%	2%	\$ 7,501	\$ 7,550	(1)%
Principal transactions	2,779	3,449	3,714	4,076	1,361	(19)	104	14,018	12,059	16
Lending- and deposit-related fees	1,726	1,626	1,535	1,482	1,538	6	12	6,369	6,052	5
Asset management, administration and commissions	4,347	4,351	4,353	4,114	4,195		4	17,165	17,118	-
Investment securities gains/(losses)	123	78	44	13	(24)	58	NM	258	(395)	NM
Mortgage fees and related income	474	887	279	396	203	(47)	133	2,036	1,254	62
Card income	1,381	1,283	1,366	1,274	1,366	8	1	5,304	4,989	6
Other income	1,492	1,472	1,292	1,475	1,302	1	15	5,731	5,343	7
Noninterest revenue	14,165	15,113	14,434	14,670	11,755	(6)	21	58,382	53,970	8
Interest income (a)	19,927	21,121	21,603	21,389	20,601	(6)	(3)	84,040	76,100	10
Interest expense (a)	5,761	6,893	7,205	6,936	6,247	(16)	(8)	26,795	21,041	27
Net interest income	14,166	14,228	14,398	14,453	14,354	_	(1)	57,245	55,059	4
TOTAL NET REVENUE	28,331	29,341	28,832	29,123	26,109	(3)	9	115,627	109,029	6
Provision for credit losses	1,427	1,514	1,149	1,495	1,548	(6)	(8)	5,585	4,871	15
NONINTEREST EXPENSE										
Compensation expense	8,088	8,583	8,547	8,937	7,809	(6)	4	34,155	33,117	3
Occupancy expense	1,084	1,110	1,060	1,068	1,069	(2)	1	4,322	3,952	9
Technology, communications and equipment expense	2,585	2,494	2,378	2,364	2,361	4	9	9,821	8,802	12
Professional and outside services	2,226	2,056	2,212	2,039	2,169	8	3	8,533	8,502	-
Marketing	893	945	862	879	894	(6)		3,579	3,290	9
Other expense (b)	1,463	1,234	1,282	1,108	1,418	19	3	5,087	5,731	(11)
TOTAL NONINTEREST EXPENSE	16,339	16,422	16,341	16,395	15,720	(1)	4	65,497	63,394	3
Income before income tax expense	10,565	11,405	11,342	11,233	8,841	(7)	20	44,545	40,764	9
Income tax expense	2,045	2,325	1,690 (	e) 2,054	1,775	(12)	15	8,114 (	e) 8,290	(2)
NET INCOME	\$ 8,520	\$ 9,080	\$ 9,652	\$ 9,179	\$ 7,066	(6)	21	\$ 36,431	\$ 32,474	12

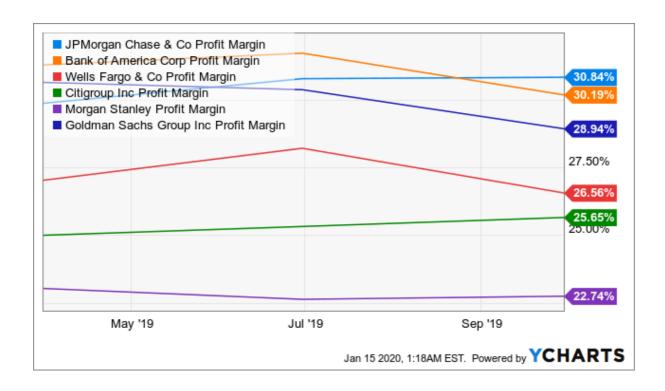
The real boost to revenues were caused by principle transaction fees.

Let's have a look at each business segments

LINE OF BUSINESS NET REVENUE (c)																
Consumer & Community Banking	•	14.040	•	14.259		13.833	•	13.751	s	13.695	(2)	3	•	55.883		52.079
Corporate & Investment Bank	•	9,471	•	9,338	•	9,641	•	9.848	•	7,237	(2)	31	•	38,298		36,448
											1					
Commercial Banking		2,228		2,207		2,211		2,338		2,306	1	(3)		8,984		9,059
Asset & Wealth Management		3,700		3,568		3,559		3,489		3,439	4	8		14,316		14,076
Corporate		(228)		692		322	_	425	_	127	NM	NM	_	1,211	_	(128)
TOTAL NET REVENUE	\$	29,211	\$	30,064	\$	29,566	\$	29,851	\$	26,804	(3)	9	\$	118,692	\$	111,534
LINE OF BUSINESS NET INCOME																
Consumer & Community Banking	\$	4,231	\$	4,273	\$	4,174	\$	3,963	\$	4,028	(1)	5	\$	16,641	\$	14,852
Corporate & Investment Bank		2,927		2,809		2,935		3,251		1,975	4	48		11,922		11,773
Commercial Banking		938		937		996		1,053		1,036	_	(9)		3,924		4,237
Asset & Wealth Management		785		668		719		661		604	18	30		2,833		2,853
Corporate		(361)		393		828		251	_	(577)	NM	37		1,111		(1,241)
NET INCOME	\$	8,520	\$	9,080	\$	9,652	\$	9,179	\$	7,066	(6)	21	\$	36,431	\$	32,474

47% of revenues came from consumer and community banking. But this segment has only a profit margin of 30% while the Corporate and Investment banking business has a profit margin of 32%, commercial banking 46% and AWM 20%.

The overall profit margin is 31% and is the highest among its peers.



JPMORGAN CHASE & CO.

CONSUMER & COMMUNITY BANKING
FINANCIAL HIGHLIGHTS
(In millions, except ratio data)

#### JPMORGAN CHASE & CO.

		QUARTERLY TRENDS 4Q19 Change											FI	ULL YEAR			
		10.000		112.22						C-11 -				- 200			2019 Change
		Q19	_	3Q19	- 0	2Q19		1Q19	_	4Q18	3Q19	4Q18		2019	_	2018	2018
INCOME STATEMENT																	
REVENUE																	
Lending- and deposit-related fees	\$	1,032	\$	1,026	\$	928	\$	873	\$	956	1%	8%	\$	3,859	\$	3,624	6%
Asset management, administration and commissions		609		608		664		618		610	_	_		2,499		2,402	4
Mortgage fees and related income (a)		474		886		279		396		203	(47)	133		2,035		1,252	63
Card income		1,246		1,176		1,257		1,168		1,255	6	(1)		4,847		4,554	6
All other income	- 02	1,413		1,399		1,312		1,278		1,173	1	20		5,402		4,428	22
Noninterest revenue		4,774		5,095	3	4,440		4,333	33	4,197	(6)	14	88	18,642		16,260	15
Net interest income (a)		9,266		9,164		9,393		9,418	77.0	9,498	1	(2)		37,241		35,819	4
TOTAL NET REVENUE		14,040		14,259		13,833		13,751		13,695	(2)	3		55,883		52,079	7
Provision for credit losses		1,207		1,311		1,120		1,314		1,348	(8)	(10)		4,952		4,753	4
NONINTEREST EXPENSE																	
Compensation expense		2,637		2,683		2,672		2,708		2,618	(2)	1		10,700		10,534	2
Noncompensation expense (b)		4,596		4,607		4,490		4,503		4,447		3		18,196		17,301	5
TOTAL NONINTEREST EXPENSE		7,233	=	7,290	=	7,162		7,211		7,065	(1)	2		28,896		27,835	4
Income before income tax expense		5,600		5,658		5,551		5,226		5,282	(1)	6		22,035		19,491	13
Income tax expense		1,369		1,385		1,377		1,263	5947.0	1,254	(1)	9		5,394		4,639	16
NET INCOME	\$	4,231	\$	4,273	\$	4,174	\$	3,963	\$	4,028	(1)	5	\$	16,641	\$	14,852	12
REVENUE BY LINE OF BUSINESS																	
Consumer & Business Banking	S	6,442	\$	6,688	\$	6,797	S	6,568	\$	6,567	(4)	(2)	\$	26,495	\$	24,805	7
Home Lending (a)		1,250		1,465		1,118		1,346		1,322	(15)	(5)		5,179		5,484	(6)
Card, Merchant Services & Auto		6,348		6,106		5,918		5,837		5,806	4	9		24,209		21,790	11
MORTGAGE FEES AND RELATED INCOME DETAILS:																	
Net production revenue (a)		327		738		353		200		(28)	(56)	NM		1,618		268	NM
Net mortgage servicing revenue (c)		147		148		(74)		196		231	(1)	(36)		417		984	(58)
Mortgage fees and related income	\$	474	\$	886	\$	279	\$	396	\$	203	(47)	133	\$	2,035	\$	1,252	63
FINANCIAL RATIOS																	
ROE		31 %		32 %		31 %		30 9	%	30 %				31 9	%	28 5	6
Overhead ratio		52		51		52		52		52				52		53	

The consumer banking business had a good year with an increase in revenues of 7%. It is important to note the 63% gain Mortgage fees. Usually this has been a business dominated by Well Fargo but JPMorgan Chase has been opening more and more branches to compete with Wells Fargo in Central and Western USA.

JPMORGAN CHASE & CO.
CORPORATE & INVESTMENT BANK
FINANCIAL HIGHLIGHTS
(in millions, except ratio data)

## JPMORGAN CHASE & CO.

			QU	ARTERLY TRENDS				FULL YEAR
	-					4Q19 Change		2019 Change
	4Q19	3Q19	2Q19	1Q19	4Q18	3Q19 4Q18	2019	2018 2018
INCOME STATEMENT REVENUE								
Investment banking fees	\$ 1,904	\$ 1,981	\$ 1,846	\$ 1,844	\$ 1,815	(4)% 5%	\$ 7,575	\$ 7,473 1%
Principal transactions	2,930	3,418	3,885	4,163	1,485	(14) 97	14,396	12,271 17
Lending- and deposit-related fees	423	360	374	361	361	18 17	1,518	1,497 1
Asset management, administration and commissions	1,098	1,197	1,149	1,101	1,072	(8) 2	4,545	4,488 1
All other income	459	226	229	194_	281	103 63	1,108	1,239 (c) (11)
Noninterest revenue	6,814	7,182	7,483	7,663	5,014	(5) 36	29,142	26,968 8
Net interest income	2,657	2,156	2,158	2,185	2,223	23 20	9,156	9,480 (3)
TOTAL NET REVENUE (a)	9,471	9,338	9,641	9,848	7,237	1 31	38,298	<b>36,448</b> 5
Provision for credit losses	98	92	-	87	82	7 20	277	(60) NM
NONINTEREST EXPENSE								
Compensation expense	2,237	2,734	2,698	2,949	2,057	(18) 9	10,618	10,215 4
Noncompensation expense	2,994	2,614	2,789	2,504	2,624	15 14	10,901	10,703 2
TOTAL NONINTEREST EXPENSE	5,231	5,348	5,487	5,453	4,681	(2) 12	21,519	20,918 3
Income before income tax expense	4,142	3,898	4,154	4,308	2,474	6 67	16,502	15,590 6
Income tax expense	1,215	1,089	1,219	1,057	499	12 143	4,580	3,817 20
NET INCOME	\$ 2,927	\$ 2,809	\$ 2,935	\$ 3,251	\$ 1,975	4 48	\$ 11,922	\$ 11,773
FINANCIAL RATIOS								
ROE	14%	13%	14%	16%	10%		14%	16%
Overhead ratio	55	57	57	55	65		56	57
Compensation expense as percentage of total net revenue	24	29	28	30	28		28	28
REVENUE BY BUSINESS								
Investment Banking	\$ 1,823	\$ 1,871	\$ 1,776	\$ 1,745	\$ 1,720	(3) 6	\$ 7,215	\$ 6,987 3
Treasury Services	1,182	1,101	1,135	1,147	1,217	7 (3)	4,565	4,697 (3)
Lending	325	329	337	340	344	(1) (6)	1,331	1,298 3
Total Banking	3,330	3,301	3,248	3,232	3,281	1 1	13,111	12,982 1
Fixed Income Markets	3,446	3,557	3,690	3,725	1,856	(3) 86	14,418	12,706 13
Equity Markets	1,508	1,517	1,728	1,741	1,317	(1) 15	6,494	6,888 (6)
Securities Services	1,061	1,034	1,045	1,014	1,026	3 3	4,154	4,245 (2)
Credit Adjustments & Other (b)	126	(71)	(70)	136	(243)	NM NM	121	(373)NM
Total Markets & Securities Services	6,141	6,037	6,393	6,616	3,956	2 55	25,187	23,466(c) 7
TOTAL NET REVENUE	\$ 9,471	\$ 9,338	\$ 9,641	\$ 9,848	\$ 7,237	1 31	\$ 38,298	<b>\$ 36,448</b> 5

Principle Transactions form the corporate and Investment banking business has been the single most important contributor to the gains of the company this year.

JPMORGAN CHASE & CO.
COMMERCIAL BANKING
FINANCIAL HIGHLIGHTS
(in millions, except ratio data)

JPMORGAN CHASE & CO.

						QU	ARTERI	LY TRENDS							FU	ILL YEAR	
											4Q19 C	hange					2019 Change
	4	Q19	:	3Q19	:	2Q19		1Q19		4Q18	3Q19	4Q18		2019		2018	2018
INCOME STATEMENT																	
REVENUE																	
Lending- and deposit-related fees	\$	249	\$	221	\$	216	\$	227	\$	204	13%	22%	\$	913	\$	870	5%
All other income (a)		375		378		333		431		381	(1)	(2)		1,517		1,473	3
Noninterest revenue		624		599		549		658		585	4	7		2,430		2,343	4
Net interest income		1,604		1,608		1,662		1,680		1,721	_	(7)		6,554		6,716	(2)
TOTAL NET REVENUE (b)		2,228		2,207		2,211		2,338		2,306	1	(3)		8,984		9,059	(1)
Provision for credit losses		110		67		29		90		106	64	4		296		129	129
NONINTEREST EXPENSE																	
Compensation expense		444		454		438		449		426	(2)	4		1,785		1,694	5
Noncompensation expense		438		427		426		424		419	3	5		1,715		1,692	1
TOTAL NONINTEREST EXPENSE		882		881		864	=	873		845	_	4	=	3,500		3,386	3
Income before income tax expense		1,236		1,259		1,318		1,375		1,355	(2)	(9)		5,188		5,544	(6)
Income tax expense		298		322		322		322		319	(7)	(7)		1,264		1,307	(3)
NET INCOME	\$	938	\$	937	\$	996	\$	1,053	\$	1,036	_	(9)	\$	3,924	\$	4,237	(7)
Revenue by product																	
Lending	\$	1,027	\$	1,006	\$	1,012	\$	1,012	\$	997	2	3	\$	4,057	\$	4,049	_
Treasury services		952		950		989		1,029		1,055	_	(10)		3,920		4,074	(4)
Investment banking (c)		211		226		193		289		208	(7)	1		919		852	8
Other		38		25		17		8		46	52	(17)		88		84	5
Total Commercial Banking net revenue (b)	\$	2,228	\$	2,207	\$	2,211	\$	2,338	\$	2,306	1	(3)	\$	8,984	\$	9,059	(1)
Investment banking revenue, gross (d)	\$	634	\$	700	\$	592	\$	818	\$	602	(9)	5	\$	2,744	\$	2,491	10
Revenue by client segment																	
Middle Market Banking	\$	909	\$	903	\$	939	\$	951	\$	959	1	(5)	\$	3,702	\$	3,708	_
Corporate Client Banking		730		739		709		816		741	(1)	(1)		2,994		2,984	_
Commercial Real Estate Banking (e)		537		547		538		547		568	(2)	(5)		2,169		2,249	(4)
Other (e)		52		18		25		24		38	189	37		119		118	1
Total Commercial Banking net revenue (b)	\$	2,228	\$	2,207	\$	2,211	\$	2,338	\$	2,306	1	(3)	\$	8,984	\$	9,059	(1)
FINANCIAL RATIOS																	
ROE		16 %		16 %		17 9	%	19 9	6	20 %				17 9	6	20 %	
Overhead ratio		40		40		39		37		37				39		37	

			QUA	RTERLY TRENDS					FULL YEAR	
						4Q19 Cha	nge			2019 Change
	4Q19	3Q19	2Q19	1Q19	4Q18	3Q19	4Q18	2019	2018	2018
INCOME STATEMENT										
REVENUE										
Asset management, administration and commissions	\$ 2,654	\$ 2,574	\$ 2,568	\$ 2,416	\$ 2,548	3%	4%	\$ 10,212	\$ 10,171	-%
All other income	173	139	115	177	(6)	24	NM	604	368	64
Noninterest revenue	2,827	2,713	2,683	2,593	2,542	4	11	10,816	10,539	3
Net interest income	873	855	876	896	897	2	(3)	3,500	3,537	(1)
TOTAL NET REVENUE	3,700	3,568	3,559	3,489	3,439	4	8	14,316	14,076	2
Provision for credit losses	13	44	2	2	13	(70)	-	61	53	15
NONINTEREST EXPENSE										
Compensation expense	1,446	1,391	1,406	1,462	1,383	4	5	5,705	5,495	4
Noncompensation expense	1,204	1,231	1,190	1,185	1,238	(2)	(3)	4,810	4,858	(1)
TOTAL NONINTEREST EXPENSE	2,650	2,622	2,596	2,647	2,621	1	1	10,515	10,353	2
	2,000	2,022		2,011				10,010	10,000	
Income before income tax expense	1,037	902	961	840	805	15	29	3,740	3,670	2
Income tax expense	252	234	242	179	201	8	25	907	817	11
NET INCOME	\$ 785	\$ 668	\$ 719	\$ 661	\$ 604	18	30	\$ 2,833	\$ 2,853	(1)
REVENUE BY LINE OF BUSINESS										
Asset Management	\$ 1,892	\$ 1,816	\$ 1,785	\$ 1,761	\$ 1,723	4	10	\$ 7,254	\$ 7,163	1
Wealth Management	1,808	1,752	1,774	1,728	1,716	3	5	7,062	6,913	2
TOTAL NET REVENUE	\$ 3,700	\$ 3,568	\$ 3,559	\$ 3,489	\$ 3,439	4	8	\$ 14,316	\$ 14,076	2
FINANCIAL RATIOS										
ROE	29 %	24 %	27 %	25 %	26 %			26 %	6 31 9	4
Overhead ratio	72	73	73	76	76			73	74	•
Pretax margin ratio:	7.2	10	70		,,,			10		
Asset Management	30	25	25	23	25			26	26	
Wealth Management	26	25	29	25	22			26	26	
Asset & Wealth Management	28	25	27	24	23			26	26	
room & Frederick menegerinetik	20	23	21	24	23			20	20	
Headcount	24,191	24,228	23,683	24,347	23,920	-	1	24,191	23,920	1
Number of Wealth Management client advisors	2,890	2,872	2,735	2,877	2,865	1	1	2,890	2,865	1

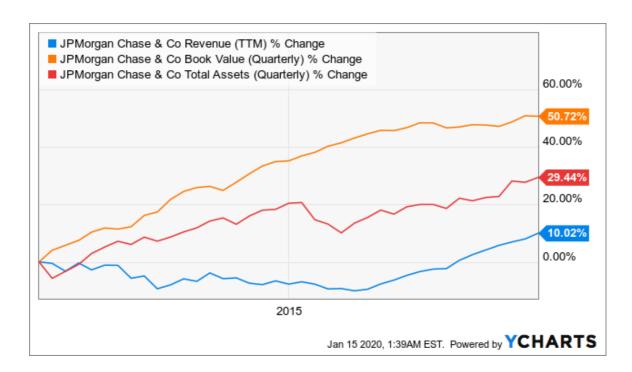
As far as commercial and AWM are concerned, they had an average year.

I will do a more detailed analysis of JPMorgan Chase when they come up with the annual report in April along with Jamie Dimon's letter to shareholders but for today, let's just have a look at the valuations of JPM.

For banks, we don't usually use the discounted free cash flow method as cash flows don't really make much sense for banks. We instead use discounted net income.

Over the last ten years, net income increased on average by 10% p.a. Can we expect that to continue? Of course, not.

They won't be able to keep increasing their ROA, ROE and profit margin.



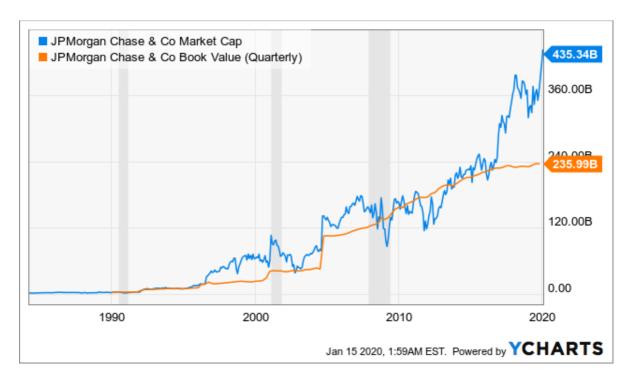
Assets can keep increasing by 2% p.a. over the long-term with the growth of the US economy (which usually grows by 2%).

Let's assume that they can gradually increase their ROA to 1.80% over the next 20 years.

We will use a discount rate of 9%.

YEAR	assets		ROA	prof	fits	Dis	scounted profits
2019	\$	2,687,379	1.33%	\$	35,742.14	\$	35,742.14
2020	\$	2,741,127	1.35%	\$	37,011.13	\$	33,680.13
2021	\$	2,795,949	1.37%	\$	38,325.17	\$	31,737.08
2022	\$	2,851,868	1.39%	\$	39,685.87	\$	29,906.12
2023	\$	2,908,905	1.41%	\$	41,094.88	\$	28,180.80
2024	\$	2,967,084	1.43%	\$	42,553.91	\$	26,555.01
2025	\$	3,026,425	1.46%	\$	44,064.74	\$	25,023.01
2026	\$	3,086,954	1.48%	\$	45,629.22	\$	23,579.40
2027	\$	3,148,693	1.50%	\$	47,249.24	\$	22,219.07
2028	\$	3,211,667	1.52%	\$	48,926.77	\$	20,937.22
2029	\$	3,275,900	1.55%	\$	50,663.87	\$	19,729.33
2030	\$	3,341,418	1.57%	\$	52,462.64	\$	18,591.12
2031	\$	3,408,246	1.59%	\$	54,325.27	\$	17,518.57
2032	\$	3,476,411	1.62%	\$	56,254.04	\$	16,507.90
2033	\$	3,545,940	1.64%	\$	58,251.28	\$	15,555.54
2034	\$	3,616,858	1.67%	\$	60,319.44	\$	14,658.12
2035	\$	3,689,195	1.69%	\$	62,461.02	\$	13,812.47
2036	\$	3,762,979	1.72%	\$	64,678.63	\$	13,015.61
2037	\$	3,838,239	1.74%	\$	66,974.98	\$	12,264.72
2038	\$	3,915,004	1.77%	\$	69,352.86	\$	11,557.15
2039	\$	3,993,304	1.80%	\$	71,879.47	\$	10,900.16
2039-inf						\$	155,714.00
						\$	597,384.65

This will give JPMorgan Chase an intrinsic value of about \$597 billion. If we take a margin of safety of 25%, we have a fair value \$447 billion.



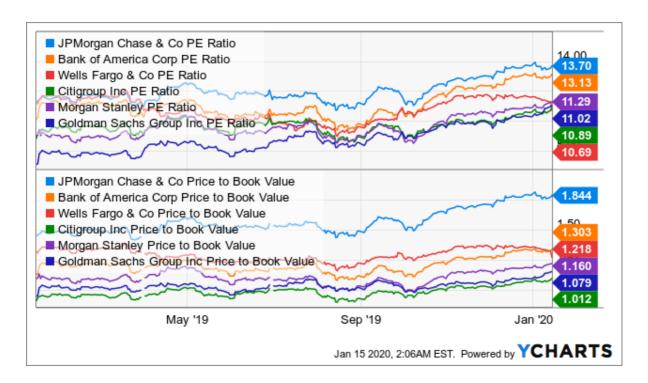
The bank currently has a market cap of \$435 billion, which makes it seem cheap. But is it? Will I buy more?

Before we answer this question, let's assume we are wrong, and that JPMorgan cannot grow their ROA further.

Even with an ROA of 1.33% in perpetuity, JPMorgan Chase will still have an intrinsic value of over \$500 billion.

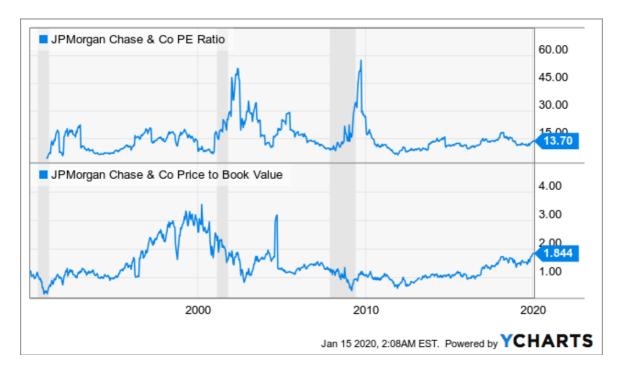
YEAR	asset	S	ROA	pro	fits	Dis	scounted profi
2019	\$	2,687,379	1.33%	\$	35,742.14	\$	35,742.14
2020	\$	2,741,127	1.33%	\$	36,456.98	\$	33,175.85
2021	\$	2,795,949	1.33%	\$	37,186.12	\$	30,793.83
2022	\$	2,851,868	1.33%	\$	37,929.85	\$	28,582.83
2023	\$	2,908,905	1.33%	\$	38,688.44	\$	26,530.58
2024	\$	2,967,084	1.33%	\$	39,462.21	\$	24,625.69
2025	\$	3,026,425	1.33%	\$	40,251.46	\$	22,857.56
2026	\$	3,086,954	1.33%	\$	41,056.48	\$	21,216.39
2027	\$	3,148,693	1.33%	\$	41,877.61	\$	19,693.05
2028	\$	3,211,667	1.33%	\$	42,715.17	\$	18,279.09
2029	\$	3,275,900	1.33%	\$	43,569.47	\$	16,966.65
2030	\$	3,341,418	1.33%	\$	44,440.86	\$	15,748.45
2031	\$	3,408,246	1.33%	\$	45,329.68	\$	14,617.71
2032	\$	3,476,411	1.33%	\$	46,236.27	\$	13,568.16
2033	\$	3,545,940	1.33%	\$	47,161.00	\$	12,593.96
2034	\$	3,616,858	1.33%	\$	48,104.22	\$	11,689.72
2035	\$	3,689,195	1.33%	\$	49,066.30	\$	10,850.40
2036	\$	3,762,979	1.33%	\$	50,047.63	\$	10,071.34
2037	\$	3,838,239	1.33%	\$	51,048.58	\$	9,348.22
2038	\$	3,915,004	1.33%	\$	52,069.55	\$	8,677.01
2039	\$	3,993,304	1.33%	\$	53,110.94	\$	8,054.00
2039-inf						\$	114,000.00
						\$	507,682.65

If we compare, JPM, with competitors, however, we will see that it is overpriced.



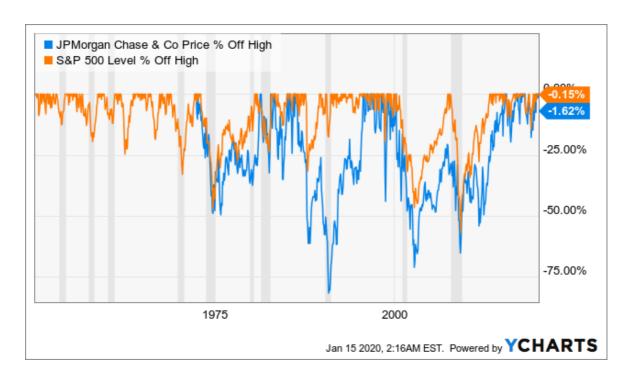
Some people will argue that there should be a premium on such a stock.

Well, let's look at historical data.



This is the highest the PB ratio has been since Jamie Dimon became CEO in December 2005. AS for the PE ratio, it has been higher in late 2017.

I am unwilling to invest in a bank with a PB ratio of 1.8 at such a time in the economic cycle. Banks are usually the most affected when there is a recession and a bear market.



Right now, 6% of my portfolio is in JPMorgan Chase. This is enough to give me exposure to the gains, to collect a nice dividend without having to fear a crash if the market tanks.



The best time to invest in JPM was in 2016. I took that opportunity to invest. Right now, I'm just going to hold but if the price ever falls, I'm going to buy.

15<sup>th</sup> of January 2020

John are levely