CENTER FOR GLOBAL FINANCIAL STUDIES Sunday, November 17, 2019 Page 1 Symbol: PETQ **Investment Thesis** Analys1 Alexandros Giannakitsidis UNIQUE LONG TERM GROWTH POTENTIAL AND EXPANSION Buy below \$22.03 Sell above \$33.07 I am initiating Buy coverage of PetIQ, Inc (PETQ) with a BUY at \$22 and a \$28.64 price target. I view PETQ as a leading seller to 94% Probability of Price Increase the retail channel of pet products that were previously only available through veterinary clinics. I view PETQ as a unique value proposition to consumers who wish to purchase veterinarian services or veterinarian-grade pet products, including prescription \$24.02 Last Price medications, over-the-counter preventatives and health and wellness products for pets. PETQ is still an early stage business and has Intrinsic Value \$25.44 all the qualities of becoming a leader in the market of healthcare distribution for pets. PETQ benefits from the how households Target Dividends \$0.00 views their pets and people wanting to provide the best quality products to maintain the health of these pets. Through the aquisition of Community Veterinary Clinics,LLC (VIP), PETQ is able to further expansion of veterinary services and distribution of products as Target Price \$28.64 VIP has a comprehensive suite of services at community clinics and welnness centers hosted as pet retailers across 31 states. PETQ is showing characteristics of a growing company with ability to further increase revenue and expansion, but at the same time they Share Price Performance 40 have generated meaningful free cash flow. I believe PETQ is a unique up-start with an attractive value proposition with favorable industry dynamics and an opportunity for top line growth potential. 35 30 1. Attractive Pet Industry Trends: Approximately 63.4 million U.S households owned a dog or cat and with changing demographic trends in pet ownership and changing 25 attitudes towards pets support the continued growth of PETQ. According to a study by Packaged Facts, in the U.S, an estimated ٤ 20 79% of dog and 77% of cat owners view their pets as family members and say they behave like "pet parents". Consumers are more concerned about the health of their pets and as a result their is an increase in spending on veterinary care as well as purchases of 15 verterinarian-grade pet products abd supplies. There is an increase in pet age and incidents of pet diseas. The longer pets live the more there is a need for spending on medical needs. An increasing market also benefits PETQ as in 2017 there was \$80 billion spent 10 on pets with the likelihood of this increasing in the future. 2. Growth of Pet Medication Purchases from Retail Channel: The Market for pet medication and health and wellness products in the retail channel is likely to outpace growth in the broader pet industry. More consumers will migrate from purchasing these goods only at veterinary clinics to purchasing them from their local D М s retail store as this provides more convenience to the consumer and substantial costs savings. With PETQ increasing their product penetration in retail increasing, this provides potential upside and growth for the company. ■ Volume Health Care 3. Expansion Through Acquisitions like VIP: As a result of the acquisition of VIP, PETQ has increasd the size of their business significantly and entered a new line of business PetIQ, Inc. operates as a pet health and wellness company. in veterinary services. The acquisition provides a comprehensive suite of services at community clinics and wellness centers hosted at pet retailers across 31 states. These services include diagnostic tests, vaccinations, prescription medications, microchipping and wellness checks. With the addition of VIP, PETQ is able to serve more than 40 retail partners representing more than 60,000 locations Health Care For the short: Industry Health Care Providers and Services 1. Industry Pressure in a Highly Competitive Market: Last Guidance December 11, 2018 The pet and wellness industry is highly competitive. PETQ competes directly with distributors and manufacturers. Compete with Next earnings date March 9, 2020 companies like Perrigo, Unicharm company, and Central Garden and Pet Company, all of which have more financial resources. If PETQ fails to identify and adapt to changes in consumer preferences more quickly than their competitors than they will fail over the long term. Other factors include ability to succesfully marketing their products or competing with cost pressures from competitors. Christensen, McCord, Chairman of the Board & CEO 2. Decrease in Spending on Pet Due to Ecnomic Climate: Sholtis, Susan, President If there were to be an economic decline or recession this could negatively impact consumer spending on pets and households will Newland, John, Chief Financial Officer have less disposable income to spend and as a result may decrease their spending on their pets. This will greatly affect the revenue of PETQ. Herrman Robert General Counsel & Secretary Smith Michael Executive Vice President of Products Division Key Catalysts for price change · Favorable trends in the pet industry · Growth of pet medication purchases from the retail channel Top Competitors · Expansion through acquisitions Apollo Medical Holdings, Inc. PetMed Express, Inc Freshpet, Inc Hanger, Inc Owens & Minor, Inc. Cross Country Healthcare, Inc. My \$28.64 price target is derived from 50% Discounted Levered Free Cash Flow estimates and 50% EV/Rev Multiple. The Pennant Group, Inc. The Providence Service Corporation Triple-S Management Corporation RadNet Inc \$562.55 Shares outstanding (mil) Market Capitalization (mil) 23.42 Last Price per share \$24.02 Weighted Diluted shares outstanding (mil) 22 12 52 week high \$36.33 Options and Warrants (Shares equivalent) 0.00 % shares held by institutions 52-week low \$2128 109% 0.00% 89% Volatility % shares held by investments Managers 0.53 % shares held by hedge funds 16.68% Daily volume (mil) 20.67% % shares held by VC/PE firms 15 246% Short interest Davs to cover short interest 11.46 % shares held by insiders 1.12% 52.95% Beta 2.29 Poison Pill and Type NONE Quarterly Earning Surprises (Actual/Median Estimates) Last 5 quarters Profitability PETQ (LTM) PETQ Historical Peers' Median (LTM) Return on Capital 1.6% 0.58% 6 77% 9/30/2018 \$525.528 (5.1%) Adjusted EBITDA Margin 2.9% -0 70% 6 26% 12/31/2018 \$444.096 (13.7%) 13.8% 3/31/2019 Return on Equity -0.9% \$593,744 (6.1%) 6/30/2019 Adjusted Net marain -0.4% 2 7% \$882,536 (13.3%) Invested Funds PETQ Historical Peers' Median (LTM) 9/30/2019 \$744.1 (8.4%) PETQ (LTM) Cash/Capital 11.0% 1.3% 5.5% History Last 2 years NWC/Capital 16.7% 15.8% 5.2% Mean Surprise 7.92% Operating Assets/Capital 33.2% 80.8% 42.4% 99th percentile "surprise" range -8% to 23% Goodwill/Capital 39 2% 22% 27 7% **EBITDA** Last 5 quarters Capital Structure PETQ (LTM) PETO Historical Peers' Median (LTM) 9/30/2018 \$39.016 (-29.1%) Total Debt/(Market Cap.+ Other Claims on Capital) 0.31 0.08 0.20 12/31/2018 \$-18.82 (-167.2%) 92% 51% 0.0% 3/31/2019 Minority Interest/(Market Cap.+ Other Claims on Capital) \$28 684 (-6 9%) Preferred Equity/(Market Cap.+ Other Claims on Capital) 0.0% 0.0% 0.0% 6/30/2019 \$64.4 (-10.3%) С 9/30/2019 \$52.008 (-32.6%) CGFS Credit Rating D Credit Rating Mode b+ to bbb+ to bb-History: Last 2 years Probability of Default Model -26.97% 5.34% Likely Current Cost of Debt 6.06% 99th percentile "surprise" range -209% to 155% Likely Current Cost of Equity (Cost of Debt + MRP) 11.31% 12 04% Likely Current WACC 9 64% 10.8%

CENTER FOR GLOBAL FINANCIAL STUDIES	5	PETQ		Sunday, No	ovember 17, 2019	Page 2
PetIQ, Inc.	Symbol: PETQ		Cost of Capital Estimates			
Analyst	Alexandros Giannakitsidis			CGFS Credit Rating	Credit Rating Model	Probability of Default ModelModel
Buy below	\$22.03		Implied Cost of Borrowing (PETQ)	7.8%	5.8%	7.8%
Sell above	\$33.07		Implied Cost of Borrowing (Peers)	6,5%	6.2%	5.9%
Probability of Price Increase	94%			Base Year	Explicit Period (15 years)	Continuing Period
Last Price	\$24.02		Cost of New Debt Estimate	6.14%	6.18%	•
Intrinsic Value	\$25.44		Country Risk Premium Estimate	5.97%	5.97%	_
	·		•			_
Target Dividends	\$0.00		Cost of Equity Estimate	12.11%	12,15%	7
Target Price	\$28.64		WACC Estimate	9.85%	9.88%	9.88%
Forecast Assumptions						
Fiscal Year	Revenue Growth	EBITDA Margin	CAPEX/Revenue	DPR/CAPEX	Other	
Base Year (Actual)	93.39%	3.5%	1.4%	1.65	SBC/Revenue	0.88%
year 1	20.00%	5.0%	1,1%	1.92		Constant/same as LTM
year 2	17.00%	9.1%	2.0%	0.94	Lease term	10
year 3	13.00%	10.3%	2.0%	0.90	Rent Expense/Revenue	0.97%
year 4	12.00%	10.0%	1.9%	0.91		Tappers off to historical average
year 5	11.21%	9.8%	1.8%	0.91	R&D life	10
year 6	10.00%	9.5%	1.7%	0.92	R&D Expense/Revenue	0.04%
year 7	9.25%	9.3%	1.5%	0.93	•	Constant/same as LTM
year 8	8.00%	9.0%	1.4%	0.94	LIFO Reserve	Tappers off to zero
year 9	7.31%	8.8%	1.3%	0.94	Non-operating pension costs	Tappers off to zero
year 10	6.62%	8.5%	1.2%	0.95	Net financing pensions costs	Tappers off to zero
					= "	"
year 11	5.94%	8.3%	1.1%	0.96	Overfunded pension plans	Tappers off to zero
year 12	5.25%	8.0%	1.0%	0.97	Capitalized interests	Constant/same as LTM
year 13	4.56%	7.8%	0.8%	0.98	Dividends/Revenue	0.00%
year 14	3.87%	7.5%	0.7%	0.98	Tax Rate	19.40%
year 15	3.19%	7.0%	0.6%	0.99		
Continuing Period	2.50%	7.0%	1%	1.00		
Simulation Assumptions						
Random Variables	Distribution Assumption	MAX	Likelly	MIN	Canaitivita y Duina Vanion	an Adduitemation Analysis
Deviations in annual Revenue GrowthExpl. Per.	Triangular	14.08%	0%	-18.12%	Sensitivity: Price Varian	•
Deviations in annual Revenue GrowthCont. Per.	Normal	1.41%	0%	-1.41%		Revenue growth
Deviations from EBITDA Margin base annual estimates	Triangular	2,19%	0%	-5.50%		EBITDA Margin
Deviations from CAPEX/Revenue base annual estimates	Triangular	1.39%	0%	0,97%		85.26% CAPEX/Rev
Deviations from Kd base annual estimates	Triangular	2,47%	0%	-2.24% 7.31 %	1	Discount Rate
Deviations from CRP base annual estimates	Triangular	1,36%	0%	-2.38%		
	-					TEV/Rev
Deviations from TEV/Revenue base estimate	Triangular	5.96	0%	-1,11		TEV/EBITDA
Deviations from TEV/Revenue base estimate	Triangular	30.05	0%	-3.24		P/BV
Change in P/BV (TTM)	Triangular	13.32	0%	-2.30		P/E
Change in P/E (FW)	Triangular	83.68	0%	-14.13		
Recovery Rate	Triangular	10.00%	0%	-10% 0.00%		Asset Recovery Rate
Valuation						
DCF Valuation				Intrinsic	Value DistributionProbab	ility (Upside)=93.6%
	Base	Explicit Period (Average)	Continuing Period			/ (0 po.do) > 0.0.0
Revenues	\$666.12	\$1,613.95	\$2,503.79			
Net Margin	0%	5%	5%			_
LFCF	\$2.78	\$72.39	\$120.51			
Ke	12,11%	12.15%	12.15%			III-la -
ROE	-0.90%	15.52%	18.56%			
	5.75.3	10.02.0	10.00%			
Relative Valuation	ı					
REIGHTE VANUATION	Madian Touritie Lite 10:1	Desia	Tundind Court 1/1			
leura en en	Median Justified Multiple	Basis	Implied Equity Value			
EV/Rev (FW)	1,2x	\$819.40	\$601.76	1 1 1 1 1 1	0\ 0\ 0\ 0\ 0\ 0\ 0\ 0\ 0\ 0\ 0\ 0\ 0\ 0	8 6 6 6 6 6 6
EV/EBITDA (FW)	11,3x	\$46.04	\$123.39	*p, *'y, *'Jo, *'Sp, *'y, *	39, * po, * 20, * 20, * po, * 10, * 10, * 20, *	, W. J.
P/BV (TTM)	2.8x	\$291.05	\$813.55	·· -x ·x •g* •g* •g	י אָל צי יצי צי צי גי גי גי גי גי גי גי	س کم یکی وکی وکی وکی در
P/E (FW)	22.6x	\$10.27	\$232.37			
Asset Based Valuation			Valuation Summary	Intrinsic Value	Target Price	Model Weight
Recovery Rate	60%		DCF Valuation	\$ 28.20	•	<u>-</u>
Capital	\$1,032.65		EV/Rev (FW)	\$ 27.20	•	
	\$353.49					
Intangibles			EV/EBITDA (FW)	\$ 5.58	•	
Claims	\$378.90		P/BV (TTM)	\$ 36.77		
Implied Equity Value	\$28.61		P/E (FW)	\$ 10.50		
			Asset Based Valuation	\$ 1.29	\$ 1.42	0%
			Price per Share	\$ 27.70		