AABOG Report on Harvey Mudd Position in National Ranking Systems

March 26, 2022

Authors: Grace Credo '96, Eun Bin Go '15, Ron Lloyd '80, Carman Ng '02, Gerald Van Hecke '61

Introduction

National college rankings by popular media are intended for use by high school seniors and parents in their searches for secondary education. We believe they may also affect the prestige of the college in the minds of the public and have an in-direct effect on hiring decisions for alums.

Three examples of college and university ranking reports visible in US popular media are: **US News and World Reports (USNWR), Princeton Review (Princeton), and Forbes Magazine (Forbes)**. The three systems are very different including the schools they compare, the sources for information, and the criteria they examine – and are therefore not directly comparable. The methodologies of each will be briefly discussed.

HMC has historically enjoyed a top 20 ranking in **USNWR** (as high as **#12** in 2018) but is currently ranked **#28** in the National Liberal Arts Colleges category for 2022.

HMC has appeared in the unranked **Princeton Review's** "**Best Colleges**" publication for many years, has appeared in **9** of the specific attribute lists (limited to top 20), and currently appears in many of their unranked "Best of..." or "Great..." lists. Under the subset of "**Best Value Colleges**" HMC currently appears in three of their ranked lists: **#5** in "**Top 50 Best Value Schools**", **#2** in "**Top 20 Best Value Colleges w/o Private Aid**" and **#1** in "**Career Placement**", in the category of private schools.

In the **Forbes "America's Top Colleges**" list, HMC is currently ranked **#89** (as high as **#18** in 2017). This list includes national liberal arts colleges and public and private universities.

Our team endeavored to understand:

- Where HMC currently stands in the rankings systems
- What change (improvement or decline) has occurred to HMC's rank in those systems
- What systemic causes, either in ranking methodology or HMC attributes may have occurred to cause those changes

From the above, we also make recommendations on key areas that need to be addressed by HMC if there is a desire to improve the college's rankings. Because we believe the current position of HMC on these lists is not indicative of its quality and there are areas where HMC could do better, we recommend actions that can benefit the entire college community (students, faculty, staff, alumni, parents) and could positively impact these rankings.

US News and World Report

USNWR is arguably the most well-known of the ranking systems and provides extensive information on current college rankings, along with USNWR's methodology and algorithms for current years. We were unable to get detailed historical data, as that is only available to the colleges themselves. We were able to find 3rd party

studies showing overall rankings data for past years and present the Claremont College cohorts for comparison in Chart 1.

The USNWR methodology examines 17 different criteria, weighting each, and combining several of those into the large categories of **Outcomes, Expert Opinion, Faculty Resources, Financial Resources, Student Excellence, and Alumni Giving.** The information is collected from self-reported data by the schools and surveys from college other college administrators and high school counselors. The scores of each of these categories are then combined into an overall score for the colleges and those scores are numerically ranked. Also, the scoring is normalized against the top school in that category, which is automatically assigned 100%. So the difference between any two schools may be quite small in actual scoring, but then show up as a large spread in the ranking.

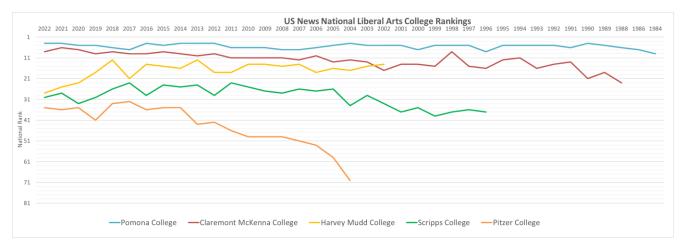


Chart 1: USNWR national rankings for the Claremont Colleges cohort, 1984 to 2022

HMC entered the National Liberal Arts Colleges rankings in 2002, when the college was classified as such. There is no prior data for HMC in this category, although HMC was ranked as an engineering college in prior years. The Scripps and Pitzer rankings were categorized by quartiles for the earlier years, and as such there is no specific ranking data for those years.

It is clear from this data that HMC has seen a relatively steep decline in ranking since 2018 and was largely flat (range: #12 to #18) for the years prior. Over the larger period, the rest of the Claremont Colleges cohort has improved rankings, or remained flat in the case of Pomona who has consistently enjoyed a top 7 ranking.

Source: Andrew G. Reiter, "U.S. News & World Report Historical Liberal Arts College and University Rankings," available at: http://andyreiter.com/datasets/							U	SN	WR	Na	atio	nal	Lit	oera	1 A	rts	Col	leg	es I	Ran	k (s	subs	set)			
College	Max Improvement (+) since 2000	Max Decline (-)	Improvement (+) / Decline (-) since 2018	2022	2021	2020	2019	2018	2017	2016	2015	2014	2013	2012	2011	2010	2009	2008	2007	2006	2005	2004	2003	2002	2001	2000
Pomona College	3	0	2	4	4	5	5	6	7	4	5	4	4	4	6	6	6	7	7	6	5	4	5	5	5	7
Claremont McKenna College	9	-2	-2	8	6	7	9	8	9	9	8	9	10	9	11	11	11	11	12	10	13	12	13	17	14	14
Harvey Mudd College	0	-16	-16	28	25	23	18	12	21	14	15	16	12	18	18	14	14	15	14	18	16	17	15	14		
Scripps College	7	-7	-4	30	28	33	30	26	23	29	24	25	24	29	23	25	27	28	26	27	26	34	29	33	37	35
Pitzer College	35	-3	-2	35	36	35	41	33	32	36	35	35	43	42	46	49	49	49	51	53	59	70				

Chart 2: Tabular data for USNWR rankings graph of the Claremont cohort, and improvements or declines in ranking performance

US News Rankings Comparison

Catagony Sub Catagory	Walate	202		Domost	14/-1-L·	20:	
Category Sub-Category	Weight	НМС	СМС	Pomona	Weight	HMC	СМС
Overall Rank		28	8	4		12	8
Overall Score (out of 100)		79	90	93			
Outcomes	40%				30%	อ	
Overall outcomes rank	40%	32	18	4	30%		
Graduation & Retention rank		6	14	6		1	
	17.60%	93%	92%	94%	18%		
Avg 6-year graduation rate	4.40%	93%	92%				
Avg first-year student retention rate	4.40%			95%	4.50%	<u>)</u>	
Social Mobility Rank	2 50%	183	183	80			
6-year Pell grant grad rate	2.50%	84%	91%	91%			
6-year non-Pell grad rate	2.50%	94%	92%	95%			
Predictred grad rate	8%	94%	92%	92%	7.50%	5	
Over/Under performance		-1%		2%		-	
Graduate indebtedness rank		58	11	5			
Graduating students who borrowed	2%	48%	19%	22%			
Average federal indebetedness	3%	<mark>\$21,943</mark>	\$14,726	<mark>\$13,195</mark>			
Expert Opinion	20%				22.50%	5	
Expert Opinion Score (0-5)		4.4	4.3	4.5			
						-	
Faculty Resources	20%				20%	5	
Faculty Resources Rank		96	3	13		4	
Faculty Compensation Rank	7%	25	13	22	N/A	N N	
Full-time faculty %	1%	98%	95.50%	91%	N/A	N N	
degree	3%	98%	99%	97%	N/A	\	
Class-size index	8%				N/A	N N	
Classes with fewer than 20 students		63%	82.20%	<mark>78%</mark>			
Classes with 50 or more students		6%	0%	0%			
Student-faculty-ratio	1%	8:01	8:01	7:01	N/A	Ň	
	10%	1		1	100	7	
Financial Resources Financial Resources Rank	10%	24	14	8	10%	b	
Financial Resources Rank		24	14	0			
Student Excellence	7%				12.50%	5	
Student Excellence Rank		48	22	3			
SAT/ACT 25th-75th percentile	5%	1570	1500	1540	N/A	N N	
class	2%	N/A	73%	90%	N/A	N N	
Alumni Giving	3%	1	1		5%	3	
Alumni Giving Rank	5%	98	16	52	5%	, ,	
		16.50%	33.40%	22.70%		-	

Chart 3: Side by side comparison of USNWR's 2022 ranking data for HMC, CMC, and Pomona; and weighting differences from 2018.

USNWR's current categories and weightings appear in Chart 3, along with a comparison for those weightings from 2018 (which we were also able to find). The comparison for HMC's rank from 2022 to 2018 is shown in red. Remarkable comparisons with CMC and Pomona within 2022 are shown in yellow. Remarkable comparisons in weighting between 2022 and 2018 are shown in orange.

The comparison of HMC from 2018 to 2022 is most relevant, as HMC's ranking peaked in 2018 at #12, and has fallen since then to #28.

Specific commentary:

- 1. HMC's outcomes rank is well below CMC and Pomona, but seems particularly affected by graduate indebtedness, where our rank is 58. A much greater share of HMC students are taking federal loans, and taking on a greater debt. Note also that indebtedness was not a criterion in the 2018 rankings.
- 2. Social mobility ranks are low for all three schools, so that doesn't appear to be driving the relative difference in overall Outcomes rank, although HMC's 6-year Pell Grant graduation rate is notably lower than CMC or Pomona. Note also that Pell Grant performance was not utilized in the 2018 rankings and is a newer addition to the methodology.
- HMC's faculty resources rank is remarkably low, both in absolute terms and relative to the cohorts. While the faculty compensation rank is lower than CMC and Pomona, the overall rank appears to be heavily driven by class sizes. HMC has a higher % of class sizes over 20 and 50, despite having a very similar student/teacher ratio (8:1) to the cohorts.
- 4. Despite having very high SAT/ACT test score performance of its incoming classes, HMC's student excellence rank is a low #48. HMC has an "N/A" for high school class ranking performance of incoming students. Is this because HMC simply didn't report the data? That alone appears to be accountable for the low overall rank in this area.
- **5.** Financial Resources rank is determined by the operating funds spent per student on an annual basis.
- **6.** Alumni giving rank (#98) and the share of alumni giving annually to the college (16%) are both very low compared to the cohorts. If alumni giving is an expression of the perceived value and pride the alums have in the college, then this single metric is a cause for great concern.

The way that various schools recruit donations from alums may vary and affect the outcome. For example, it's possible to pad the score with large numbers of very small donations that don't materially affect the overall dollars given.

It's also possible that the rate of giving has diminished for more recent graduation years for all schools, and that HMC's relatively young alumni demographic puts more weight on recent alums than a school with 100 years of relatively consistent class sizes.

Without knowing more this metric deserves further investigation and possibly cause for action by AABOG, the Administration, and the BOT.

Princeton Review (not affiliated with Princeton University):

The Princeton Review methodology is to survey a large number of students (143,000 at 386 schools for the 2021 edition), on 85 specific questions; and use that data to create an overall and unranked "**Best 386 Colleges**" list, and then list the **Top 20** schools in **62** different ranking categories. Students do not rank colleges other than their own, so the appearance of a school on any of its lists is purely based upon the feedback of students from that school, as compared to the feedback of students from and about other schools.

As stated above, HMC has appeared consistently on the overall list, and many of the attribute-specific Top 20 lists. It is difficult to assess whether an improvement or decline in HMC's ranking has occurred, other than to report which lists it has appeared on, and when those appearances occurred.

As Princeton Review does not boil down its feedback into a single all-encompassing ranking, as compared to USNWR, there is no real way to compare the two ranking systems. However, it can be

noted that high rankings in attribute categories at USNWR can be correlated to appearing on Top 20 lists from Princeton Review.

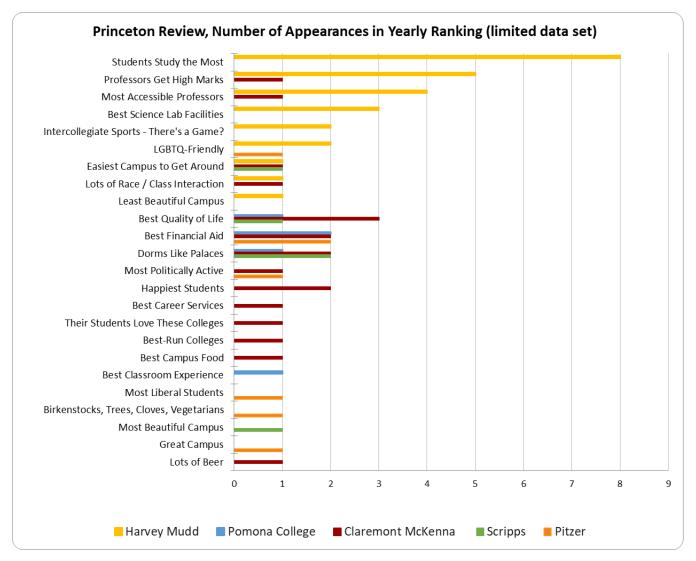


Chart 4: Number of appearances in the Princeton "Top 20 schools" lists for specific attributes, for the Claremont cohorts

Specific commentary:

- 1. It is no surprise that HMC has appeared consistently in the "Best Schools" list. That number varies each year (~370-390) based upon where Princeton Review decides to draw the threshold line, but we would be alarmed if HMC didn't make such a broad list.
- 2. Appearance in any Top 20 list makes a school stand out from the crowd. Most, but not all of these are positive, for example "Least Beautiful Campus".
- 3. While students may disagree, alums generally take pride in the "Students Study the Most" attribute.
- 4. Note also the multiple appearances for Professor Accessibility and Professors Get High Marks.

- 5. Since the Princeton Review system includes larger universities in direct comparison to small privates, it is not surprising that HMC doesn't appear on many of the 62 Top 20 lists. We do not view that as a cause for concern.
- 6. It is noted that several of the Claremont Cohort have been lauded for Financial Aid, and HMC has not.
- 7. Princeton's lists are arguably more useful than USNWR's ranking system, since a prospective student can filter for the features of a college that they care about most.

Forbes Magazine

The Forbes Magazine methodology for ranking is similar to USNWR in that they analyze a variety of weighted categories, including primarily objective data and some student feedback. It was difficult to find complete sets of the Forbes data, so our tables and charts include gaps where we were not able to find the data via research.

Forbes ranks national public and private universities and liberal arts colleges, with a range of approximately 600 schools selected based on their Carnegie Classification and availability of sufficient data from two federal databases (The College Scorecard and Integrated Postsecondary Education Data System [IPEDS].

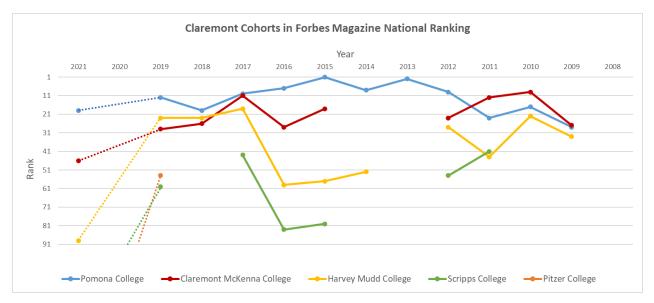


Chart 5: Forbes national rankings for the Claremont Colleges cohort, 2008 – 2021

The broader ranking data we have includes rankings for some schools in 2008, but we did not find data for the Claremont Colleges cohort, so that year appears to be blank. Ranking data was not collected in 2020 due to the Covid pandemic, so we have added a dotted line to bridge the gap from 2019 to 2021. Pitzer does have ranking data for the some years prior to 2019, but the graph was cutoff at #91 to make the relative changes for the rest of the cohort more visible.

Forbes Magazine - Top Colle	ege List (C	laremont (Cohorts O	nly)										
Source(s): Available information	on via Inter	net search												
	Ranking													
College Name	2021	2020	2019	2018	2017	2016	2015	2014	2013	2012	2011	2010	2009	2008
Pomona College	19		12	19	10	7	1	8	2	9	23	17	28	
Claremont McKenna College	46		29	26	11	28	18			23	12	9	27	
Harvey Mudd College	89		23	23	18	59	57	52		28	44	22	33	
Scripps College	146		60		43	83	80			54	41			
Pitzer College	299		54			123	109							

Chart 6: Tabular data for the Forbes rankings for the Claremont Colleges cohort, 2008 – 2021 (incomplete dataset)

Forbes Magazine - Ranking Criteria		
Source(s): Available information via Internet search		
Green Text = Calculated Value		
Category	2021	2018
Post Graduate Success	35	35
Alumni Salary on PayScale.com	20	20
Alumni in Forbes/CCAP Corporate Officers List	15	15
Student Satisfaction / Student Experience	10	20
Freshman-to-Sophomore Retention Rates	10	15
Niche Website Ranking		5
Student Debt	15	20
Four-Year Debt Load	7.5	
Five-Year Loan Repayment Rates	7.5	
Four Year Graduation Rate	15	12.5
Actual Four-Year Graduation Rate		7.5
Six-Year Graduation Rate	10	2.5
Pell Grant Recipent Graduation Rate	5	2.5
Competitive Awards / Academic Success	10	12.5
Prestigious Scholarships and Fellowships	5	6.25
PhD	5	6.25
Return on Investment	15	
General Premium (from Third Way)	10	
Premium for Low-Income Graduates (from Third Way)	5	

Chart 7: Forbes ranking criteria 2018 vs 2021

Forbes weighting criteria used in 2018 and 2021 for the rankings appears in Chart 7. The years 2018 vs 2021 were intentionally chosen to map as closely as possible to the available USNWR data. Weights for categories are shown in green, and the constituent weights appear beneath them in black. Similar to USNWR, Forbes has de-emphasized student retention rates and increased emphasis on ROI. The ROI is obtained by dividing the total cost of a degree by the earnings boost graduates achieve as compared to a typical high school graduate in that state. It is not clear if the salary information used is based upon that college's graduates, or a state-wide demographic. A separate premium (5%) is given to low-income graduates in the ROI section.

Specific Commentary:

- The Forbes ranking system is more business and financial outcomes oriented than the USNWR system, with a 35% weighting given to salaries and corporate officer status. Alumni giving and faculty resources are not considered in this system, where they are included in USNWR. The focus on corporate leadership would appear to disfavor liberal arts colleges, particularly where a significant portion of the graduates have careers in academia. This is somewhat mitigated by a 10% weighting for fellowships and PhD achievement – which should favor HMC and other STEM schools.
- 2. Overall, the more recent focus on ROI and change from 4-year to 6-year graduation rates would account for the significant rise in public universities in their ranking system. Student debt appears to have been de-emphasized in recent years, but without the specific constituent data for how debt is weighted, we cannot comment further on whether this has improved public university rankings.
- 3. HMC's more recent decline in the Forbes ranking is clearly visible, similar to the decline in USNWR. Some of that can be attributed to the relative increase in public university rankings as commented above. However, when all university rankings are removed from the dataset, a significant gap exists between HMC and both CMC and Pomona.

Summary and Recommendations:

HMC has seen a significant ranking reduction in the USNWR and Forbes ranking systems since 2018, but it is inconclusive as to whether that same thing has occurred in the Princeton Review system. With the more detailed USNWR data it is enlightening to compare HMC's rankings in particular areas to CMC and Pomona, where HMC currently trails. Alumni Giving, Class Sizes, Graduate Indebtedness, Pell-Grant Graduation Rate, and High School Class Rank are all categories where HMC's ranking is being negatively affected. The weighting changes in the USNWR system since 2018 is putting more emphasis on Pell Grant graduation rates and graduate indebtedness, which further exacerbates the effects of those particular categories. While we cannot attribute any specific quantitative ranking changes to changes in weighting, we do believe there is a significant ranking impact caused by the weighting changes instituted at USNWR.

The decline in Forbes ranking and relative performance to the Claremont cohort provides credence to the theory that USNWR is not an anomaly, which is an important result. The Forbes methodology has also been modified since 2018 to increase emphasis on ROI and decrease emphasis on student retention and 4-year graduation rates, which improves the relative performance of public institutions.

The Princeton Review rankings show very high regard for HMC by its students in particular ranking lists, and we did not find evidence of significant degradation of HMC's standing in the overall Best Colleges list, or in the specific ranked lists where HMC appears. However, due to the lack of transparency for the historical information for the Princeton Review lists, we do not have data to perform any trends analysis.

We recommend that AABOG, the Administration, and the Board of Trustees further examine HMC's current ranking and changes in ranking in the USNWR, Forbes, and Princeton Review systems over the past 10-20 years and institute policies to improve those results. With noted subjectivity, we believe that HMC should consistently be ranked in the top 10-20 liberal arts colleges in the US, whether appearing on the USNWR or Forbes Magazine list; and maintain its standing on the Princeton Review lists.