


2016 Academic Rankings of World Universities
Summary

The Shanghai Ranking Consultancy released its 2016 Academic Ranking of World Universities (ARWU), also known as the Shanghai Ranking, on August 15, 2016. In total, more than 1,200 universities were ranked and the top 500 were published. The University of Saskatchewan (U of S) was placed in the 401-500 category¹, dropping from 301-400 last year.

Nineteen Canadian universities were placed in the top 500. The University of Toronto was ranked the highest at 27th, followed by the University of British Columbia (34th), McGill University (63th) and McMaster University (83th). University of Alberta was ranked 101-150 while University of Montreal was in the 151-200 category. Laval University, Queen's University, University of Calgary, University of Ottawa, University of Victoria, University of Waterloo, and Western University were ranked 201-300. Dalhousie University, University of Guelph, and University of Quebec were ranked 301-400. Simon Fraser University and University of Manitoba were ranked 401-500, along with the University of Saskatchewan.

What is the ranking based on?

The ARWU ranking is based on the weighted scores of six indicators (see below) collected from third party data with 40% of the weighting based on quality of faculty, 40% on research output, and 20% on quality of education and per capita performance combined.

Area	Indicator	Weight	Source
Quality of Education	Number of alumni winning Nobel Prizes in the sciences or Fields Medals in mathematics (Alumni)	10%	Official Nobel Prize site and International Mathematical Union for Fields Medals
Quality of Faculty	Number of staff winning Nobel Prizes in the sciences or Fields Medals in mathematics (Award)	20%	Thomson Reuters websites
	Number of highly cited researchers in 22 broad subject categories according to Thomson Reuters' 2015 list of Highly Cited Researchers (HiCi)	20%	
Research Output	Number of 'articles' or 'proceedings papers' published in Nature and Science over the last five years (N&S)	20%	Thomson Reuters websites
	Number of 'articles' or 'proceedings papers' indexed in Science Citation Index-Expanded and Social Sciences Citation Index in previous year (PUB)	20%	
Per Capita Performance	Per capita academic performance with respect to the size of an institution (PCP)	10%	ARWU indicators/ university data from national agencies

For more information about ARWU's ranking methodology, please go to: <http://www.shanghairanking.com/ARWU-Methodology-2016.html>

¹ The top 100 universities are ranked individually from 1st to 100th place. The remaining universities are ranked into the following categories: Top 101-150, Top 151-200, Top 201-300, Top 301-400, and Top 401-500.

Scores of the University of Saskatchewan

The following table illustrates the scores for the U of S on each of the six indicators that make up the ARWU ranking.

	Alumni	Award	HiCi	N&S	PUB	PCP	OVERALL
U of S score	8.9 ¹	0	0	8.3	33.5	16.2	11.1²
Median score for U15 ³	8.9	0	14.5	13.1	44.4	22.1	17.4
U of S rank among U15	8 th	5 th ⁴	11 th ⁵	14 th	15 th	14 th	14th

¹ Indicator scores are calculated by dividing the actual indicator value by the top university value for that indicator and multiplying by 100. The U of S score of 15.5 on PCP does not mean that faculty at the university have on average 15.5 publications, rather it means the success of our university on PCP is 15.5% of the top university for this indicator.

² ARWU does not publish scores for institutions that are ranked lower than the top 100. This score was determined based on a calculation using the scores and weights for the six individual indicators.

³ The U15 Group of Canadian Research Universities include University of Alberta, University of British Columbia, University of Calgary, Dalhousie University, Laval University, University of Manitoba, McGill University, McMaster University, University of Montreal, University of Ottawa, Queen's University, University of Saskatchewan, University of Toronto, University of Waterloo, and Western University.

⁴ U of S tied with 10 other institutions at 0. Only four universities scored higher than 0 in this category.

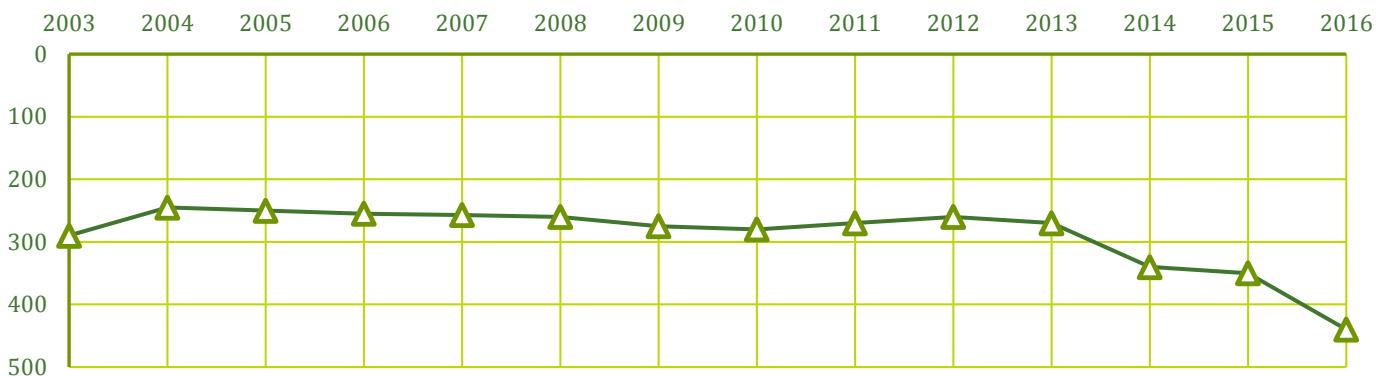
⁵ U of S tied with four other institutions at 0.

Performance of the University of Saskatchewan from 2003 to 2016

The U of S consistently ranked in the 201-300 range between 2003 and 2013, but experienced significant decline over the last three years. This decline can be attributed primarily to significantly lowered scores in the number of highly cited researchers, which was resulted from a change in how the list of higher cited researchers was created by Thomson Reuters. The U of S had four highly cited researchers on the previous list, but none on the new list. In order to have a relatively smooth transition, in 2014 and 2015 ARWU compiled the score based equally on both the old and new lists. This year, however, the score was calculated using the new methodology only.

Our scores in other ranking indicators have either improved or stayed the same in recent years.

U of S Rankings in ARWU, 2003-2016



Rankings by subject

This year, the Shanghai Ranking Consultancy also published rankings in seven specific subjects: chemical engineering, civil engineering, electrical & electronic engineering, energy science & engineering, environmental science & engineering, materials science & engineering, and mechanical engineering. The rankings were based on the weighted total scores from eight indicators:

- The number of papers authored by an institution and indexed in Scopus in each engineering subject
- The number of world top 25% most cited papers in each engineering subject an institution has
- The number of world top 1% most cited papers in each engineering subject an institution has
- How the number of citations received by an institution's publications compares with the average number of citations received by all other similar publications in each engineering subject the Scopus database
- The extent to which an institution's publications have international co-authorship.
- The percentage of an institution's publication with academic and corporate or industrial co-authors.
- Most Cited Researchers in each engineering subject
- The total number of the staff of an institution winning a significant award in an engineering subject. Von Hippel Award issued by Materials Research Society in the United States is selected for Materials Science & Engineering ranking and Tyler Prize issued by University of Southern California in the United States is selected for Environmental Science & Engineering ranking.

University	Chemical Engineering (Top 300)	Civil Engineering (Top 100)	Electrical & Electronic Engineering (Top 400)	Energy Science & Engineering (Top 200)	Environmental Science & Engineering (Top 400)	Materials Science & Engineering (Top 600)	Mechanical Engineering (Top 300)	Number of Subjects Ranked
University of Toronto	39	76-100	27	151-200	25	42	51-75	7
University of British Columbia	151-200	76-100	51-75	101-150	11	151-200	51-75	7
McGill University	201-300		201-300	151-200	51-75	101-150	151-200	6
University of Alberta	101-150	76-100	76-100	101-150	41	201-300	76-100	7
University of Montreal	201-300		201-300		101-150	201-300	201-300	5
McMaster University	201-300		151-200		201-300	151-200	76-100	5
University of Ottawa	101-150		201-300		201-300	401-600	201-300	5
Queen's University			201-300		201-300	301-400		3
University of Calgary	151-200		301-400	101-150	201-300	401-600		5
University of Laval	151-200					101-150		2
Waterloo University	101-150	51-75	34	32	101-150	101-150	51-75	7
Western University		76-100		151-200	201-300	301-400		4
Dalhousie University				48	101-150	201-300		3
University of Manitoba					301-400			1
University of Saskatchewan			201-300	51-75	76-100	401-600	151-200	5

For more information, visit

www.usask.ca/ipa