



UFSS Impact Report

2023

T: +27(0)51 401 3624 | E: ctl@ufs.ac.za | www.ufs.ac.za/ctl

 UFSUV |  UFSweb |  UFSweb |  ufsuv

Inspiring excellence. Transforming lives.

UNIVERSITY OF THE
FREE STATE
UNIVERSITEIT VAN DIE
VRYSTAAT
YUNIVESITHI YA
FREISTATA



UFS·UV
CENTRE FOR TEACHING
AND LEARNING (CTL)

Introduction

This report aims to show the impact the UFSS module has on first year students' transition and academic achievement in their first year of study.

UFSS is a compulsory, credit-bearing module for all first-year students across the Bloemfontein and Qwaqwa campuses and is a prerequisite for degree completion. It is aimed at helping students transition into university by focusing on teaching students the academic skills they will need to be successful in their studies. These skills include computer literacy, time management and goal setting, study skills, referencing and plagiarism, financial literacy, and how to develop a growth mindset. UFSS further teaches students to make the most of their undergraduate experience to prepare for the world of work. The employability skills include topics like developing strategies for success, teaching students to maintain a healthy balance between academics and their lifestyle, developing an entrepreneurial mindset, getting themselves ready for the 21st century workforce, getting students to start editing their CV's, creating a LinkedIn profile, helping students reflect on the career paths they are pursuing, and teaching them about the UFS Graduate Attributes and how they can develop these. The career and employability focus within the UFSS module acts as a starting point for the newly developed Career and Employability Pathway, which forms part of a collaborative funding partnership between the University of the Free State (UFS) and the Michael and Susan Dell Foundation to enhance the success of UFS graduates.

The UFSS module is coordinated within the Transition, Development and Success focus area of the Centre for Teaching and Learning (CTL) and has continually adapted its content and format to best serve students and faculties (see Figure 1). UFSS is considered a High Impact Practice, defined by Kuh (2008) as scaled and purposeful interventions that have a significant impact on the educational experiences and development of students. Similar transitional programmes are implemented across several public higher education institutions in South Africa, and the UFSS team has been playing a leading role in the national Siyaphumelela First Year Experience Workstream, along with the Durban University of Technology, the University of the Western Cape, Wits University, the University of Cape Town, and the University of KwaZulu Natal.

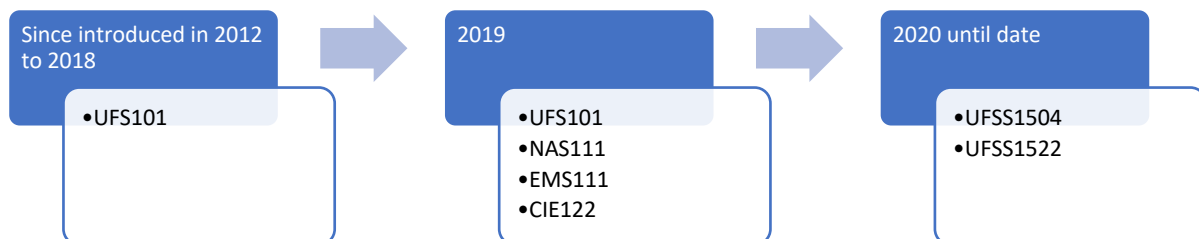


Figure 1 Evolution of UFSS

With the National Benchmark Test results consistently showing that the vast majority of students entering higher education need additional support (e.g., Centre for Educational Testing for Access and Placement, 2019), and around 80% of UFS students being the first in their generation to obtain a university qualification (South African Survey of Student Engagement, 2021), the need to help students transition successfully into university is clear.

The impact of UFSS: Correlations with academic achievement

To prove the impact UFSS has on students' success, a correlational analysis was done between students' UFSS marks and their average final first year marks, captured on PeopleSoft. Table 1 shows the findings, differentiating between the different UFSS formats between 2018 and 2022. **On average, there is a 69% correlation between first year students' UFSS marks and their final first year mark, which includes all other modules they registered for in that year. This correlation is consistent pre- and post-Covid and all of the correlations are significant.**

Table 1 Correlations between academic achievement in UFSS and other modules

Module	Correlation	P-value	Sample size
2018_UFS101	70%	0.000	9003
2019_UFS101	68%	0.000	8028
2019_NAS111	69%	0.000	199
2019_EMS111	66%	0.000	162
2019_CIE122	67%	0.000	336
2021_1504	79%	0.000	5597
2021_1522	62%	0.000	2559
2022_1504	78%	0.000	6391
2022_1522	66%	0.000	2342

The impact of UFSS: Supporting students to transition into university

To determine the impact of UFSS as a transitional programme, a multiple linear regression was done for each of the UFSS modules between 2018 and 2022. Standardized coefficients (also called beta coefficients) were created for the students' UFSS module marks, Admission Point (AP) scores and school quintiles. Beta coefficients are created to generate comparable variables – therefore comparing so-called apples with apples.

This process is usually done to investigate which of the independent variables (in our case UFSS module marks, AP scores and school quintiles) has a greater effect on the dependent variable (in our case PeopleSoft average final marks) in a multiple regression analysis. It can be considered a general measure of effect size, quantifying the magnitude of the effect of one variable on another.

This analysis had a sample size of 27,151 students across four years. The sample size for this analysis was 21% lower than the correlational analysis due to the unavailability of quintile and AP score data for all students.

Table 2 shows the following findings of the regression analysis:

- In the pre-Covid years (2018, 2019) students' UFSS marks on average contributed 2.4 times more to their average final marks than their AP score and 7.6 times more than their school quintile status.
- In the post-Covid years (2021, 2022) students' UFSS marks on average contributed 25 times more to their average final marks than their AP score and 20 times more than their school quintile status.

- When comparing 2021 and 2022 mainstream and extended students' betas, the betas differ by 1% to 2%. One would expect that AP and Quintile might have a greater influence on students' average final marks in the extended program, but this result suggests that the UFSS modules closes this gap.
- The R-square of these models showed that there is still a lot of unexplained variance, which means that these three factors are not the only factors that influence the success of students.

An important note to consider is that the format of the UFSS module changed to a summer and winter school format since the pandemic, which might contribute to the strengthened influence of the module on students' academic performance.

Table 2 Beta coefficients that contribute to average final marks on PeopleSoft

Module	UFSS mark beta	AP score beta	Quintile beta	Sample Size
2018_UFS101	73%	12%	1%	6842
2019_UFS101	73%	6%	1%	6117
2019_NAS111	43%	39%	18%	160
2019_EMS111	57%	29%	4%	128
2019_CIE122	49%	39%	15%	264
2021_1504 (main)	81%	0%	1%	4508
2021_1522 (ext)	70%	6%	3%	1960
2022_1504 (main)	82%	5%	6%	5236
2022_1522 (ext)	72%	1%	5%	1936

The impact of UFSS: Qualitative evidence of impact

The UFSS team implements an evidence-based approach in line with an action research cycle (see Figure 2) to keep the module relevant and responsive to the needs of students and faculties. The process includes:

- (i) *Identification of focus*: helping our students to transition from high school to the university.
- (ii) *Generating plans*: making use of various theories that inform how we respond to the problem we have identified, for example using Sally Kift's (2009) work on transitional pedagogy, underlying learning theories of Piaget and Vygotsky on constructivism (Vygotsky, 1978; Wadsworth, 2004), and experiential learning (Kolb, 1984).
- (iii) *Implementation*: for curriculum design and content development, we make use of backward design approach (e.g., Fink, 2003). We begin with the creation of an integration map in which teaching activities and assessments are created with the outcome in mind.
- (iv) *Evidence-based reflections and evaluations*: We collect evidence through module evaluations so that we can reflect on what went well and what did not go well and what we need to modify as a result of that.
- (v) *Modification of practices*: Making changes that are evidence-based and continuing with the action research cycle all over again.

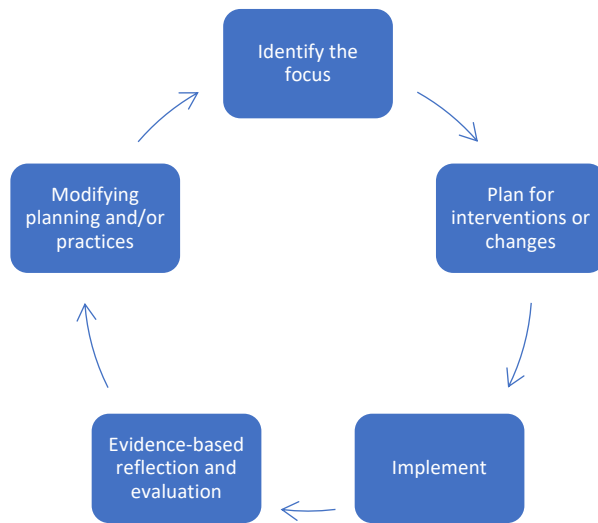


Figure 2 Action research cycle

Students' evaluations of the module are therefore an important contributor to the design and quality of the module. However, for the purposes of this report, we opted to not include granular evaluation data, but rather to include qualitative data gathered through the administration of the South African Survey of Student Engagement (SASSE).

For the 2021 administration of the SASSE, administered by the Evidence-Based Change focus area within the CTL, a qualitative question was added: **What has been the most important factor contributing to your learning and development at this institution and explain why it is important.** Over 14,000 students completed this question nationally, with over 4,500 representing the UFS. Several UFS students mentioned the UFSS module as the most important factor that contributed to their learning and development at the UFS. Some key aspects of the UFSS module that students listed in the SASSE data are shown next.

UFSS supports students' transitions from school to university

Many students commented on how the UFSS module helped them to adjust to university. This includes academic skills, such as teaching them how to manage their time, how to study, how to be efficient learners, digital skills, and several others. In parallel, students appreciate how the UFSS module also helps them to develop soft skills, such as mindfulness, critical thinking, communication skills, and creativity to help them with the transition. The UFSS module also provides students with information on where to find academic and non-academic support, should they need it. Some of students' own voices about how the module has helped them transition are shared here:

*The core modules I take such as EDUB, GPED and TPRI are important as they build a foundation upon which all my future professional skills can be created, adjusted and improved. However, **modules such as ENGE, AFRL, UFSS and MTBI have offered me the opportunity to further skills that lay dormant.** As an academic, I am very thankful for the opportunity of diverse learning.*

*The UFSS module has been of great help in **understanding how the university environment works and how to survive.***

*The UFSS module helped so much - **from how to use a computer, as I am from a rural area with no experience of computer, to time management and adapting to a new environment.** UFSS is the most important factor that contributed to my learning and development.*

*The most important factor to my learning at this institution contributing to learning and development has been this module called UFSS. It has helped me develop myself at this institution as it **helps prepare us to cope with university life.** We get support and developmental skills like entrepreneurial skills, learning strategies, sign language, time management. **We use all these skills in our academic and our daily lives, because we did not know about them.***

*UFSS101 module. **It has covered various areas that are key for a smooth adjustment to the university and online learning. It has also covered other areas outside of academics and guidance thereof.***

*UFSS module. In that module I was helped to adapt to university and divide my time accordingly. They also helped on how to search and find information for assignments and other academic activities. **In general, the module was helpful and not only for academic purposes but for life as general.***

*It has taught me to work hard so that I will be independent and **since I have bipolar disorder, modules like UFSS have inculcated a positive mindset.***

*The UFSS module. As an introvert, I have learnt how to uplift my **self-esteem and ways to communicate** - that lead to me consulting my classmate to assist me in a learning unit I didn't understand.*

*The most important factor that contributed on my learning development is, this year I am doing module called UFSS, which helped me greatly with **time management, improving my entrepreneurial skills, writing a CV, and thinking creatively and critically.***

***Time management-** because I struggle with procrastination, learning how to manage my time has been very difficult for me but I am working on it with the help of the UFSS module.*

*My two core modules, SCNS and UFSS have contributed so much to my university experience. **I have learnt so many life (school, personal and social) skills that I use almost on a daily basis.** Things like time management, organising myself and my work, being and lifelong learner, just to name a few. All the skills and values I learnt in those modules have helped me achieve everything I have in university so far.*

*LLS and UFSS modules, simply because they **provide information** based on how to manage your time effectively, effective study methods, how to adapt to the online environment, how to earn an income whilst you are studying, giving information on what*

skills are required of an individual in order to adapt in varsity and the workforce, where to get social support, and many more.

Transference of skills and knowledge

An important aim of the UFSS module is for students to internalise the knowledge, skills and competencies they acquire in UFSS so that they can implement what they have learnt in other modules and in their personal lives. Several students mentioned the value of transferring skills learnt in UFSS:

*My UFSS module. It has taught me so many things I didn't know and how to go about when it comes to my academics - not only in this module but in all my other modules. I **have learned some strategies to pass my module and it challenged me to think out of the box and be a critical thinker.***

*The lessons I learnt in UFSS. I **learnt about the SWOT analysis** [strengths, weaknesses, opportunities and threats], goal setting, the power of positive thinking, and these lessons challenged me to know myself as a student. To identify my weaknesses, opportunities and strengths so that I can use them to my advantage. Learning has become easier since then and I have been improving in my modules.*

*The UFSS module has been the most important factor contributing to my learning and development at this institution. It is important because **I was able to compose a SWOT analysis of what worked and what did not work in semester 1, which enabled me to eliminate my shortcomings in semester 2.***

Career and entrepreneurship

Focusing on a career focus from first year, as well as relevant skills for the workplace – digital skills and upskilling through LinkedIn and other platforms.

*The developmental modules have played an important role in my academic experience, especially UFSS. This module has made me **develop skills that will be needed in the work environment** and has taught me on **how to improve on other skills that I want to improve, how to protect my digital footprint** and everything that aligns with it.*

*Honestly **the UFSS module really contributed to the way I think about and look at life.** Before, I hardly thought about doing other things like starting a small business while studying, I always thought a person can't do a lot at one time.*

*My compulsory first-year module UFSS contributed to my learning and development at the institution because **I learned about studying strategies that worked for me and I have also developed an entrepreneurial mindset which I had little knowledge about.***

***The UFSS module helped me find a career path that will work for me by considering my strengths and weaknesses.** I'm confident in what I am doing currently. The module motivated me and helped me find my purpose in life.*

Conclusion

This report aimed to investigate the impact the UFSS module has had on first year students' transition into university. The results showed a strong correlation between academic performance in UFSS and other modules in the same year. In addition, the UFSS module is a much stronger contributor to students' academic achievement than AP scores or school quintiles. These are important findings because it shows the significant impact a supportive environment can make to students' success. The qualitative data confirms the value students gain from the module - as a platform to gain academic knowledge and skills, developing soft skills, and being introduced to reflecting on career paths, employability resources, and entrepreneurship. Ultimately, the UFSS module, particularly in the post-COVID environment, is a significant contributor to the transition and success of first year students.

References

- Centre for Educational Testing for Access and Placement. 2019. The national benchmark tests national report. Retrieved from:
<https://nbt.uct.ac.za/sites/default/files/NBT%20National%20Report%202019.pdf>
- Fink, L.D. 2003. A Self-Directed Guide to Designing Courses for Significant Learning. Retrieved from:
https://www.bu.edu/sph/files/2014/03/www.deefinkandassociates.com_GuidetoCourseDesign_Aug05.pdf
- Kift, S. 2009. Articulating a transition pedagogy to scaffold and to enhance the first year student learning experience in Australian higher education. Australian Learning and Teaching Council. Retrieved from: <https://transitionpedagogy.com.au/wp-content/uploads/2014/05/Kift-Sally-ALTC-Senior-Fellowship-Report-Sep-09.pdf>
- Kolb, D.A. 1984. *Experiential learning: Experience as the source of learning and development* (Vol. 1). Englewood Cliffs, NJ: Prentice-Hall.
- Kuh, G.D. 2008. *High-impact educational practices: What they are, who has access to them, and why they matter*. Washington, DC: Association of American Colleges and Universities.
- South African Survey of Student Engagement. 2021. UFS SASSE. Institutional Report.
- Vygotsky, L.S. 1978. *Mind in society: The development of higher psychological processes*. Cambridge, MA: Harvard University Press.
- Wadsworth, B.J. 2004. *Piaget's theory of cognitive and affective development: Foundations of constructivism*. New York: Longman.