The Impact of Athletic Performance on Academic Achievement of Division I Student-Athletes

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The Impact of Athletic Performance on Academic Achievement of Division I Student-Athletes

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Abstract

When considering Division I student-athletes, their athletic abilities are the first thing that comes to mind, when it comes to their academic responsibilities, things are often overlooked. Today the NCAA oversees a four billion dollar athletics industry in the United States made up of over 75,000 student-athletes participating in 36 different sports at the Division I level. Considering a small percentage of these student-athletes go on to compete at the professional level, the ultimate goal of attending college is to graduate and move onto a career rather than participate in athletics. With that being said, between the large time commitments and the overall importance placed on athletes, academic eligibility and academic performance can be extremely stressful for both the athlete and coach. In order to determine ways to better support Division I student athletes, their time commitment, academic support system success and impact on grade point average were all evaluated. The overall purpose of this synthesis project was to review the literature on the relationship of athletic participation on academic achievement of Division I intercollegiate athletes. Results indicated the average Division I student-athlete can have a time commitment of nearly 40 hours per week between academics, athletics, leisure activities, socialization and other maintenance activities. Along with that, results noted that while academic support systems have improved greatly, there is room for improvement and until the academic gap is closed they will not be adequate. Finally, there was a variance in results on the impact on grade point average, so it was concluded more research is needed to draw conclusions.

Chapter One - Introduction

University athletic administrators and academic advisors are constantly seeking and developing programs that help student athletes navigate through the social, academic and personal intricacies of university life (Chen, Mason, Middleton & Salazar, 2013). In 2007, the NCAA launched a television campaign with the tagline “There are over 380,000 student-athletes, and most of us go pro in something other than sports.” With the purpose of promoting the importance of academics for NCAA student athletes. Student athletes must leverage their academic achievements to demonstrate their capital (Insler & Karam, 2019).

Physical activity can enhance academic performance by increasing the flow of blood to the brain, enhancing arousal levels, changing hormonal secretion, increasing mental alertness and improving self-esteem (Bailey, 2005). With that being said, athletic participation can be very time consuming. NCAA rules state that teams may not extend beyond 20 hours of practice or competition per week during the season and eight hours per week during the offseason. Certain things such as compliance meetings are not included (NCAA, 2020). Student-athletes are often isolated from the traditional student population of the institution, mainly due to increased involvement in sport (Scott & Castles, 2017). While graduation rates of Division 1 student athletes have increased over the past 25 years, there is still much room for growth (NCAA, 2009). Academic support systems and coaching staff perceived the communicated importance of academics appears to play a role in student-athlete success (Hazelbaker, 2015). Additionally, it appears academic support systems are not “one size fits all”. Not all standard formats for support systems such as study hall may be an appropriate method for helping today's athletes to 'make the grade' (Dilley-Knoles, Jennifer, Burnett & Peak, 2010).

Statement of the Problem:

The purpose of attending school is to learn, grow and make achievements in your young adult life. For some students, it comes easily, others not as much. Athletics can be seen as a reward or motivating factor for students to reach higher achievement levels. The problem here is each school's athletic and educational programs differ and results of studies on this matter vary. With that information athletic departments should consistently research the best methods to run an educational athletic department focused on maximizing student-athlete achievement.

Purpose of the Study:

The purpose of this synthesis project is to review the literature on the relationship of athletic participation on academic achievement of Division I intercollegiate athletes.

Operational Definitions:

1. Academic Achievement: Performing at a high level in the classroom, including but not limited to classroom participation, handing in assignments, creating quality work, punctuality in class, high grades.
2. GPA: Grade Point Average.
3. GSR: Graduation Success Rate.
4. Student-Athlete: A student who is enrolled full time as a student while simultaneously participating in a team or individual based sport.
5. Full Time Student: A student enrolled in a minimum of 12 undergraduate (or 9 graduate) credit hours per semester.

Research Questions:

1. What is the typical weekly/daily time commitment of a Division I student-athlete?
2. Are student-athletes provided adequate academic support systems?

3. How does athletic participation impact grade point average?

Delimitations:

1. Only Division 1 intercollegiate student-athletes will be studied.
2. Only student-athletes enrolled as full time students will be included.
3. Only students participating in a school connected athletic program will be included.
4. Articles had to fit certain criteria for inclusion, they were required to be published in academic journals or by the National Collegiate Athletic Association within the last 10 years, (with the exception for two articles for minor supportive claims or numbers). Articles needed to be full texts and provide supportive information towards the research question, sub questions and review of literature.

Chapter Two - Methods

The purpose of this chapter is to review the methods utilized to review the literature on the effects of athletic participation on academic achievement in Division I student-athletes. The studies collected for this synthesis were located using the EBSCO database from The College at Brockport's Drake Library. Within the EBSCO database the following database was searched: SPORTDiscus. In addition, information was obtained from the National College Athletics Association (NCAA) website.

The SPORTDiscus database was navigated through utilization of key words relating to the research question including athletic participation, academic achievement, academic performance, student-athlete support systems, Division I student-athletes, and cognitive function. These searches all resulted in thousands of results. Search results were further refined by only allowing for full text articles to be discovered. This was done to allow the researcher to be provided with only full studies and not partial where information may be left out. Additionally, these works must be from published academic journals no earlier than the year 2010. This is to provide this synthesis with the most valid and up to date information to support the findings of the review. Athletic participation and academic achievement were searched together, they provided 38 results. When searched on its own, student-athlete support systems found 40 results, when combined with academic performance one result was provided. When searching cognitive function and academic performance, 44 results were obtained. Lastly when Division I student-athletes and academic performance were searched, 34 results were yielded. A total of 10 articles were utilized for this review of literature, nine of which have been included. Criteria for inclusion beyond the parameters previously stated required that the article revolve around the

topic relating to the purpose of the study or the research questions. The academic journal must be peer reviewed and published no earlier than 2010.

The information provided by the NCAA website was found by a simple search on their website. The NCAA is the main governance over all intercollegiate athletic departments. Information of their most up to date compliance rules and regulations is an essential factor to demonstrate the time requirements of Division I student-athletes. The research of the NCAA website concluded in obtaining an eHandbook of Bylaw Article 17 as well as an article which displays the increased graduation rate for intercollegiate athletes.

Specific criteria were required for articles to be applicable to this synthesis. The study must be in relation to the effects of athletic participation on academic achievement. These articles were required to be based around undergraduate and graduate student athletes participating in a Division I university sanctioned program. In addition, student-athletes included were required to be enrolled as full-time students, not part time.

For this synthesis, a total number of 13 articles were utilized to gather data for the review of literature. Nine of which were obtained from academic journals. These academic journals include *Sports Journal, Kentucky Association for Health, Physical Education, Recreation & Dance, International Journal of Sport Management, Recreation & Tourism, Journal of Sport Economics, Educational Review, Virginia Journal, Journal of Intercollegiate Sport and Journal of Clinical Sport Psychology*.

The critical mass for this synthesis was 1,775 Division I athletes. Subjects ranged in age from 18 to 23. 806 of these students were male, 308 were female, the gender of the remaining 661 students were not disclosed by their respective study.

Data was analyzed through a number of different methods. These methods include descriptive statistics comparing things that mediate the relationship between athletic participation and academic achievement. These statistics also assessed the relationship of different behavioral datas and the academic achievements of Division I student-athletes. These datas were obtained through methods such as semi-structured interviews, likert and number scaled surveys, questionnaires, university records and self-reported grades or behaviors. Due to the recommendations of these contributing authors, a discussion of student-athlete academic achievement in relation to athletic participation was formed.

Chapter 3 Review of Literature

The purpose of this chapter is to review the literature on the effects of athletic participation on academic achievement of Division I student-athletes. The topics included in this literature review include student-athlete time commitments, student-athlete support systems and impact on grade point average. These are three of the most important aspects that are taken into consideration when observing the student-athlete experience.

When thinking of a Division I student-athlete, one thinks of their athletic abilities. While their athletic performance is important, ultimately, they are attending the university for academics. It is essential to understand the factors behind student-athletes maintaining well-balanced athletic, academic and social lives. The first aspect to be reviewed is the time commitment associated with participating in Division I athletics.

Student-Athlete Time Commitment

What is the typical schedule of a Division I student-athlete? Chen, Mason, Middleton and Salazar (2013), examined this through behavioral data and testing scores to verify the best indicators of student-athletes' academic performance for balancing academic achievement and athletic participation. 186 voluntary Division I student-athletes completed an 11-item daily life behavioral survey. Additionally, they provided their student ID numbers to obtain their GPA.

The results of this study indicated student-athletes spend a daily average of six hours per day attending classes and studying, four hours per day at practices and competition, between 3.25 and 3.75 hours per day on social and leisure activities, 7.5 hours of sleep per night while also participating in equal amounts of campus activities as their non-athletic peers. The average GPA was a 3.09, which is in good standing.

Since 1991, student-athlete time has been limited to four hours per day and 20 hours in a single week per NCAA Division I bylaw 2.14. Another study done by Ayers, Dobose and Pazmino-Cevallos (2012), sampled 59 Division I student-athletes concerning time spent on both athletic and academic activities. The purpose of this study was to monitor student-athlete time spent on athletic activities. A survey was administered to the subjects who were asked to recall time spent weekly on academic and athletic activities. Once completed they were asked to record their weekly time spent on academic and athletic activities.

The results from this study revealed student athletes can spend anywhere from 14-30 hours in one week on athletic activities during the competitive season, 34% responded exactly 20. It was reported student-athletes spend between five and eight hours per week during the off season. Academics wise student-athletes indicated spending an average of 16.75 hours per week on academics during the competitive season. During the off season, student-athletes reported spending an average of 14.25 hours per week on academic activities.

Sleep concerns are prevalent among student-athletes and can result in impaired athletic and academic performance. Kaier et al., (2016), developed a study to investigate the feasibility and effectiveness of a brief sleep workshop for Division I student-athletes. 152 student-athletes completed a questionnaire relating to examining stress, health and performance among student-athletes, they then attended the sleep workshop in the fall semester, as well as two follow up workshops, the first two weeks later, the other three to four months later.

Results of this study indicated knowledge of sleep importance raised significantly from 39.8% to 82.5%, along with that 51% of student-athletes reported at least one sleep behavior change after attending the workshop. The results also indicated student-athletes reported a decrease in daytime sleepiness as well as an increase in daytime function.

Student-Athlete Support Systems

With intercollegiate athletics playing a major role in higher education in the United States, student-athletes are undoubtedly a major focus. Critics in higher education have argued that universities are exploiting their athletes and failing to fulfil their educational obligations to them. Hazzaa, Song and You (2018), set out to discover the student-athletes' satisfaction with academic support services and athletic departments as well as how those feelings related to GPA. 226 Division I student-athletes completed a 22 question survey assessing their satisfaction among four categories, facilities, staff, tutoring and advising programs.

Results of this study revealed that student-athletes are satisfied with the academic services, however it was noted that satisfaction rates were higher with upperclassmen in comparison to freshman. Additionally, facilities and staff have a significant influence on student-athlete satisfaction with academic services. Along with that, there was a significant relationship found with satisfaction with the department and GPA.

The overall importance placed on Division I student-athletes academic eligibility can be extremely stressful for both the coach and student-athlete. In order to participate, the student-athlete must remain academically eligible; thus, various academic support programs have been implemented by athletic departments as a means of maintaining eligibility and accomplishing the goal of academic success. The question remains, are they successful? Burnett, Dilley-Knowles and Peak (2010) set out to find the answer. The purpose of this study was to determine if the academic support program of a Division I University is successful. 379 student-athletes grades based on a four point scale were recorded.

The results of this study indicated that female student-athletes significantly performed better than their male counterparts. Along with that there are variances in grades of different sports. In conclusion, they are not as the academic gap is not closed.

Over the past 25 years the NCAA has put into place a series of academic reforms in response to various concerns for student-athletes and their academic lives. While improvements are being seen, there is still much room for growth. It can be noted that Men's Division I Basketball has the highest amount of academically ineligible student-athletes as well as the lowest graduation success rate. Hazelbaker (2015), completed a study focused on them and the factors affecting graduation rates. The compliance director from 89 Division I Universities filled out an electronic survey. The survey consisted of questions relating to demographics on academic policies and institutional programs that may have an impact on graduation rates.

The results indicated that of the 4,151 Division I Men's basketball players included in this study only 46.9% of them graduated within the six year period. Additionally records indicated that based on descriptive statistics, having an academic support staff in place has a positive correlation of .273 with graduating.

The ultimate goal of the college experience is graduation, the NCAA has devoted attention to researching student-athlete graduation rates for more than two decades. When the Graduation Success Rate was created nearly two decades ago, then-NCAA President Myles Brand set an aspirational goal of 80%. Student-athletes first surpassed that goal with the release of the rates in 2011. As a result, the NCAA created the Graduation Success Rate (GSR) for Division I. The NCAA , set out to evaluate the graduation success rate to compare the current graduation rate of this year with that of when it was first launched in 2002. All colleges and universities are required by NCAA legislation and federal law (the Student Right-to-Know act from 1990) to

report student graduation rates, and those institutions offering athletics aid are required to report for their student-athletes as well.

Results of this study indicated that the graduation success rate has increased significantly. In 2002, the GSR reported that 74% of Division I student-athletes graduated, in 2019 89% of Division I student-athletes graduated. Based on the support system changes made since 2002, 29,633 additional student-athletes have graduated (Brutag Hosick, 2019).

Division I members have adopted academic rule and policy changes intended to improve the academic performance of student-athletes. Similarly to work done in 2019, the NCAA set out to discover if support systems for Division I student-athletes were effective in 2020. They once again evaluated the Graduation Success Rate to identify the variances from 2019, when record numbers were recorded (Brutag Hosick, 2020).

The results indicated that 90% of Division I student-athletes graduated that enrolled in 2012 or sooner. Along with that, the GSR for Men's Basketball increased by 4%, being that they consistently have been the lowest performing, this is a big increase. The results from 2019 indicated an additional 29,633 students graduated; if no changes were made from 2002 to now, that number increased to 33,505. An additional 3,872 student-athletes graduated in the past year. (Brutag Hosick, 2020).

Impact on Grade Point Average

There are over 380,000 student-athletes, and most of them go into something other than sports. Athletic participation is an endogenous decision with respect to educational outcomes. To identify the causal effect, Insler and Karam (2017), developed an instrumental variable via the Universities random assignment of students into peer groups. The purpose of this study was to determine the impact of athletic participation on grades of their students. Grades of student-

athletes were obtained from the United States Naval Academy Office of Institutional Research. Grades of each student-athlete were observed from both before they began attending the University and their current grades.

Results from this study indicated athletic participation modestly reduces the grades of recruited student-athletes. The average GPA of a freshman was a 2.53, a sophomore average GPA was 2.72, the average GPA of juniors was 2.85 and the average GPA of seniors was a 2.98. It is evident that as student-athletes progress through college, their GPA increases. Prior to attending, the mean GPA of student-athletes was a 2.78.

In the past two decades, the concept of emotional intelligence (EI) has gained a great deal of attention and popularity among different disciplines. This may be due to its potential contribution to daily functioning, health and well-being of the individual and society at large. Dobersek and Arellano (2017), set out to understand if involvement in intercollegiate athletics moderates the relationship between emotional intelligence and academic achievement. 203 student-athletes completed surveys pertaining to this as well as their GPA.

Results of this study indicated that student-athletes obtained an average 3.22 GPA while their non-athletic peers averaged a 3.06. It was also noted that results from this study did not align with other studies on this matter.

It is evident based on previous research that college students benefit when they are integrated into the social and academic components of higher education. Due to the time commitment of athletics, student-athletes are often isolated from the traditional student population. Castles and De Vol Scott (2017), completed a study with the purpose of addressing student-athletes at historically black universities along with determining strategies and programs for improved student-athlete performance. Academic records of 223 student-athletes were

obtained from the National Survey for Student Engagement pertaining to the amount of time and effort student-athletes put into their studies and other educational activities. Additionally, it provided data on how the institution facilitated its resources and organized other opportunities for student-athlete learning.

Results from this study indicated the majority of student-athletes spent between one and ten hours per week preparing for class. 38% of the students who reported this also reported grades of A or A-, 52% reported between B- and B+ and 9% reported between C and C+. Along with that, 57% of the student-athletes who reported grades of A- or better lived on campus.

Summary

When examining the relationship between athletic participation of Division I student-athletes, the most important aspects to consider are student-athlete time commitments, student-athlete support systems and impact on grade point average. With the large increase in graduation success rates, it is evident that many improvements have been made. There is still much to learn on the topic as not all athletic programs consistently reach the same achievement levels. Additionally, situations for Division I Universities are not the same to another, with that being said there is still much to learn on this topic.

The importance of educating student-athletes to maintain a well-balanced academic, athletic and social life can be very important to the overall success of a student-athlete during their college career. With knowledge of the three components and how they are interrelated, student-athletes can lead to better study habits, time management skills, academic achievement, better sleeping habits and reduce stress levels. Additionally, with knowledge increasing, university athletic administrators, academic advisors, coaches, support staff, faculty and parents can better assist and support student-athletes.

There will be some student-athletes who are uninterested in achieving academically and only care about athletic performance. It is important to try and reach these student-athletes and inspire them to strive for success. Academic achievement in college is very important, the things one learns as a student can be leveraged upon graduation in order to obtain a job post-graduation. With increased knowledge on the topic more will become educated and proactive about assisting student-athletes.

Chapter 4

Results, Discussion and Recommendations for Future Research

The purpose of this chapter is to present the results of the review of literature on the effects of athletic participation on academic achievement of Division I student-athletes and how these results align with the research questions that provided the guidelines for this synthesis project. Along with that, recommendations and implications for future research of offering support to Division I student-athletes are identified.

Results

The results of the review of literature indicated that student-athletes do in fact have a very time consuming schedule that requires a large commitment. Athletics and academics alone can take up 10 hours in a single day, atop of their social life. It is imperative that coaches, athletic administrators, support staff, parents and faculty actively promote a healthy, well-balanced academic, athletic and social lifestyle.

The results of the review of literature indicate that while academic support systems have come a long way and demonstrate significant improvement in the Division I student-athlete graduation rate, it is impossible to determine if academic support systems are adequate for all student-athletes as they all have individual needs and different learning styles. All Division I athletic departments are different, a support system may work for Duke University, but may not be the right fit for the University of Alabama. Support systems need to be based around a program and its specific weaknesses that are holding back a portion of the program. As such, there are many variances to be seen in impact on student-athlete grade point averages based on factors such as sport, degree, gender and race.

Discussion

Interpretations

As part of this review of literature, three research questions were developed to guide it as well as the study as a whole. The first question was what is the typical weekly/daily time commitment of a Division I student-athlete? Chen, Mason, Middleton and Salazar (2013), concluded that the average Division I student-athlete spends six hours per day attending classes and studying, four hours per day at practices or competitions, between three and four hours daily on leisure activities and seven and a half hours sleeping. Ayers, Dobose and Pazmino-Cevallos (2012), concluded student-athletes can spend anywhere between 14 and 30 hours per week on athletics during the season and five to eight hours per week during the off-season. Additionally, their results indicated student-athletes spend an average 16.75 on academics during the season compared to 14.25 during the offseason. Lastly, Kaier, et al (2016), concluded that when student-athletes are informed of proper sleep behavior student-athletes have a decrease in daytime sleepiness as well as an increase in daytime function.

The second research question examined was are student-athletes provided adequate academic support systems? While research indicates that nine out of ten Division I student-athletes graduate (Brutlag Hosick, 2020), it appears that athletic support systems are not "one size fits all" (Burnett, Dilley-Knoles & Peak, 2010). The NCAA attributes the graduation of an additional 33,505 student-athletes over the past 25 years to increased academic support (Brutlag Hosick, 2020), however there are variances in GPA and GSR between sports and gender, which suggests some student-athletes may not be getting the support they need. Men's basketball has the highest non-qualifying student-athlete rate as well as the lowest graduation success rate

(46.9%) (Hazelbaker, 2015). Until GPAs and the GSR of all programs and genders are similar, it can be argued that they are not adequate for all Division I student-athletes.

The third and final research question examined was how does athletic participation impact grade point average? There was a variance seen in the results of the studies examined in this review of literature. Chen, Mason, Middleton and Salazar (2013), concluded based on behavioral data and resting scores the average student-athletes GPA was a 3.09. Dobersek and Arellano (2017), concluded based on their survey results the average student-athletes GPA was a 3.22. Castles and De Vol Scott (2017), concluded based on grades obtained 90% of student athletes obtained a B or higher letter grade in their classes. Lastly, Insler and Karam (2019), concluded based on grades obtained athletic participation has a modest negative impact in freshman and sophomore student-athletes, who performed between .06 to .25 of a grade point lower academically at the university versus prior to enrollment.

Implications

When it comes to previous research on the effects of athletic participation on academic achievement, there is a general agreement that athletics can be associated with positive outcomes related to academics assuming the student-athletes are provided with proper support and encouragement from head coaches, support staff and faculty. These actions will result in student-athletes having a higher satisfaction towards the athletic department and the academic support services they are provided with. Not all Division I athletic departments are the same, it is incredibly important that student-athlete educational opportunities are kept under a close watch on a program level, searching for weaknesses to improve rather than for seeking generalization of “what's good” for the athletic department as a whole. Following along with this point, some

sports such as football and basketball have a greater time commitment than a sport like tennis, which should be kept in mind when developing a new support program for student-athletes.

There was a variance in results seen relating to the impact of athletic participation on grade point average. While most studies concluded a majority of positive results, (Chen, Mason, Middleton & Salazar, 2013), (Dobersek & Arellano, 2017) and (Castles & De Vol Scott, 2017) the study done by Insler and Karam (2019), concluded a modest negative correlation when comparing performance from before attending the university to throughout their career as a student-athlete. There was a variance in results seen in previous studies as well.

From the results obtained from all of the studies, it shows athletic participation can positively affect academic achievement if mediated by the appropriate surroundings. The commonly held belief that student-athletes are "dumb jocks" despite the psychological and physical benefits obtained from athletic participation, which can be disproven. Additionally, the belief that athletics crowd up a students' schedule, student-athletes learn from early on in their athletic career to manage their emotions and utilize them accordingly to maintain a healthy lifestyle between academics, athletics and a social life.

These implications have added onto the existing knowledge of the relationship between athletic participation and academic achievement. With an increase in knowledge, athletic department employees, academic advisors, head coaches, support staff and faculty members have a better understanding of how to improve upon current support systems. Additionally, they will become more aware of the support needed by Division I student-athletes. It's very important administration, academic advisors, head coaches, support staff and faculty members understands how to properly support and motivate their student-athletes, providing them the opportunity to succeed and in turn increasing the university GPA and GSR to better the schools statistics.

Recommendations for Future Research

In reviewing the data base on the effects of athletic participation and its effects on academic achievement of Division I student-athletes, the following limitations were identified during the review process. Athletic departments range in size based on enrollment in the university, number of programs sanctioned by the athletic department and student demographic. Along with that, each sport has different time requirements, so some student-athletes have a commitment that takes away from their time that may be allocated to academics. These two aspects limit the ability to which the results from the literature can be generalized. Along with that, many studies utilized self-reported grades and perceptions from student-athletes, it is assumed they told the truth, but it is a possibility that they reported false grades, commitments and perceptions in order to make themselves, program or university look more favorable in the eyes of the researchers. Lastly, student-athletes grades should be compared with non-athletic student grades to demonstrate the variance athletics can create.

Based on these limitations and other insights pertaining to the literature the following recommendations should be considered for future research.

1. Further research should be done on the effects of athletic participation on student athlete GPA.
2. When researching effects on the GPA and graduation success rate, researchers should obtain records from the university rather than self-reports by student-athletes.
3. Further research should be done on the effectiveness of student-athlete support systems, but at a specific university and program level, rather than seeking for generalizations about Division I as a whole.

Summary

The purpose of this literature review was to determine how participation in athletics affects the academic achievement of Division I student-athletes. Delimiting variables were used to complete a comprehensive data-based search. This extensive search yielded 13 articles to be included in this review. These articles were then purposefully used to explain how participation in athletics can benefit the academic achievement of Division I student-athletes.

Research revealed that student-athletes have a very time consuming schedule, but they should be taught to maintain a balanced student-athlete life. Academic support systems are essential to assisting student-athlete academic achievement, ensuring the program implemented for the athletic department is adequate for all programs. There are still varied results on the impact athletics has on grade point average, some studies have concluded a positive relationship, some negative.

There is still room for more research, student-athletes will always struggle with academics at some point, administrators, coaches, support staff and faculty must have the knowledge on how to provide support or encouragement to the student-athlete. With an increase in content of this topic, more will become educated and will proactively try to help.

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Appendix A

Author	Title	Source	**Purpose**	Methods & Procedures	Analysis	Findings	Discussion/ Recommendations
Ayers, Pazmino-Cevallos, Dobose	The 20 Hour Rule: Student-Athletes Time Commitment to Athletics and Academics	Virgina Journal	The purpose of this study was to monitor student-athlete time spent on athletic activities.	Subjects completed a survey where they were asked to recall weekly time spend on academic and athletic activities.	Data was analyzed by examination of the survey results and journal reporting.	Student-athletes spend between 14-30 hours per week on athletics and 16.75 per week on academics during the season. During the off season they average 5-8 hours on athletics and 14.25 hours on academics.	Research Notes – Commonalities/ Differences Some student-athletes spend more than the NCAA allowance per week on athletics, some spend considerably less. 34% reported exactly 20 hours. Results did vary slightly compared to other studies. Goals can be accomplished if student-athlete attendance and schedule changes are monitored, additionally missing as few classes as possible.

Castles, De Vol Scott	Factors influencing the Academic Performance of African American Student-athletes in historically Black Colleges and Universities	Sport Journal	Address student athlete academic performance at the selected HBCUs and determine strategies and programs for improved student athlete academic performance.	Analysis of National Survey of Student Engagement organization. Measured amount of time and effort students put into their studies and other educational activities, ,measured how the institution facilitated its resources and organized curriculum/ other opportunities for student learning.	Descriptive statistics (Mean, Median, Mode) and a two-way chi square used to determine relationships with academic performance.	Positive relationship with living arrangements and academic performance. No relationship with # of hours spent getting ready for class and performance. Social involvement=more developed.	Authors recommend athletic departments place guidelines for student-athletes to live on campus throughout college. Future research should be done on freshman student athlete responses to academic performance and amount of time preparing for class, time spent in co-curricular activities and type of living arrangements too allow for comparison from freshman to senior year.

Burnett, Dilley-Knoles & Peak	Making the Grade: Academic Success in Today's Athlete.	Sport Journal Vol 13, Issue 1.	The purpose of this study was to determine if academic support systems are successful in helping student athletes earn grades that are above the GPA requirement.	379 student-athlete grades were obtained from head coaches and compliance coordinators and analyzed by sport.	GPAs were analyzed on a 4 point scale. Students who received a B or higher were considered to "achieve" academically.	Female student athletes had higher GPAs than Male student athletes. Basketball, cross-country, golf, tennis, track and softball had the highest GPAs.	Academic support systems are a mainstay of division 1 athletic departments since the 1980s. More considerations need to be made for closing the grade gap between sexes. Each athletic program has its own time requirements, additionally support systems can interfere with said requirements. Support systems should be individually focused for each program rather than utilizing the same style for all college athletic departments.

Arellano & Dobersek	Investigating the Relationship Between Emotional Intelligence, Involvement in Collegiate Sport, and Academic Performance.	Sport Journal	The purpose of this study was to investigate the relationship between student athletes and whether or not involvement in collegiate sports moderates the relationship between EI and academic achievement.	203 Students were interviewed about their perceptions on their own emotions/academic performance as well as comparing that with their peers.	Data was analyzed via descriptive statistics. A separate t-test was used to examine the differences of EI in student athletes and non-student athletes.	Positive relationship between empathy, self-confidence and academic performance. Student athletes have higher GPAs than non-student athletes.	Meeting daily exercise goals helps improve EI. Further research is needed on the effects of physical activity/sport participation on emotional intelligence, or if individuals with higher EI are more likely to participate in sports. Additionally for future research of this topic, both student athlete perspective and actual grades should be considered.

Chen, Mason, Middleton & Salazar	An Examination of Behavioral Data and Testing Scores as Indicators of Student-Athletes' Academic Success.	Kentucky Newsletter for Health, Physical Education, Recreation and Dance. Vol 51 Issue 1.	The purpose of this study is to improve the quality of prospective student athlete recruits and ensure future academic success. The findings would help athletic administrators develop practical strategies for advising student athletes as well as create a 15 minute documentary to	Behavioral data and testing scores of 186 student athletes were obtained from a survey based on several studies. These two things were identified as the best indicators of student athletes balancing academics with athletics.	The mean and standard deviation were analyzed for the following categories: Class time, Studying, Sleeping, Maintenance activities, Practice/competitions, Leisure and Social.	The average student-athlete spends 23 hours weekly on athletics (3 more than NCAA recommendation)	It is imperative to promote and maintain a well-balanced athletic and academic life for student athletes. Athletic departments should have a person responsible for monitoring each program's weekly time log to ensure they do not exceed limits. Universities should promote and extend academic and counseling services to student athletes. Coaches and advisors should help their student athletes develop daily study, time management and organizational skills. Additionally they should be educated about the reality of life and responsibilities of being a student-athlete at open houses and

			educate future prospective student athletes.				throughout the year.

Hazel baker	NCAA Academic Non-Qualifiers: Factors Effecting Graduation Rates	International Journal of Sport Management, Recreation and Tourism	The purpose of this study was to examine initial academic non-qualifiers, low graduation rate and variables that increase this rate in Division 1 Basketball student athletes.	The compliance director of each respective university filled out an electronic survey. The survey consisted of questions relating to demographics on academic policies and institutional programs that may have an impact on graduation rates.	A coaches emphasis on graduation/academics ia a key factor in improving rates.	The academic reform the NCAA has been implicating has a positive relationship with graduation.	Athletic departments need a larger budget for support systems. Additionally college athletics need to be incorporated into higher education more in order to promote the statement "educational experience is paramount. Greater attention should be paid to "junior college" graduates as well as "at risk" students to ensure student athlete retention. The results have importance to NCAA policy makers, athletic administrators and coaches to adapt their programs to identified needs.

Hazzaa, Sonkeng & Yoh	Antecedents and Consequences of Student-Athletes Contentment With Academic Services	Journal of Intercollegiate Sport	The purpose of this study was to determine factors that influence student-athletes satisfaction with academic support services	226 student-athletes completed a 22 question survey relating to facilities, staff, tutoring and advising programs.	Data of the surveys was analyzed though ANOVA, analysts of variance.	Student-athletes reported high satisfaction with support services. Facilities and staff were found to be important determinants of advising satisfaction, which positively influenced academic performance.	Previous research suggested adequate physical, human, and financial resources, coupled with institutional spending, may lead to greater academic benefits for the institution. Those benefits may include enhanced student outcomes such as student learning and degree completion. Additional support has demonstrated that investing in relevant and sufficient resources for student-athletes may increase the likelihood of persisting through to degree completion

Insler, Karam	Do Sports Crowd Out Books? The Impact of Intercollegiate Athletic Participation and Grades.	Journal of Sport Economics. Vol 20, Issue 1.	The purpose of this study was to investigate the influence of intercollegiate athletics on grades of students at the US Naval Academy.	Grades were obtained from the USNA Office of Institutional Research. Grades of each student-athlete were observed from both before they began attending the University and their current grades.	Data was analyzed through descriptive statistics such as mean and standard deviation.	Recruited student athletes have a .37 higher GPA than non-recruited. A higher GPA equivocated to higher post grad success.	Future research should be done on the variances between different sports. Additionally more research should be done on the variance in student-athlete performance in season vs out of season. For the average student there are not complementarities, but trade offs between academic achievement and athletic participation. The US Naval academy student athlete has a very different college experience due to athletic participation being required.

Brutlag Hosick	DI college athletes reach 90% graduation rate.	NCAA.org	The purpose of this article was to examine the graduation success rate from the past year.	Referencing of old reports form the GSR as well as the GSR of 2019.	Referencing of old reports form the GSR as well as the GSR of 2019.	9/10 Division I stundet-athletes graduated in the past year. An additional 33,505 have graduated since support system improvements have been made in 2002.	The federal graduation rate, however, remains the only measure to compare student-athletes with the general student body. Using this measure, student-athletes graduate at the same rate as the student body. Federal rates also provide a long-term picture of student-athlete academic achievement. The federal rate was first collected with the class that entered college in 1984, and the rate has continued to rise over the past 28 years. When rates were first collected, the general student body earned degrees at a rate higher than that of student-athletes.

NCAA	Countable Athletically Related Activites	NCAA.org	N/A it is a handbook that is strictly for information about NCAA student athlete rules and regulations	N/A	N/A	N/A	Provided information about student athlete time requirements and limits as well as accessions to the rules.
Brutlag Hosick	Division 1 Student-athletes graduate at record high rates	NCAA.org	There was no study done, just an evaluation of the Graduation Success Rate (GSR) that was created in 2002 to increase student-athlete graduation rates.	Referencing of old reports form the GSR as well as the GSR of 2019.	Referencing of old reports form the GSR and comparing them with current results.	In 2002 the goal was to have an 80% graduation rate for Division 1, in 2019 it. Was 89%. Nearly an additional 30,000 student athletes have graduated from the changes made by the NCAA to	The NCAA is now focusing on evaluating it Academic Performance program, from there they plan on improving support systems to help guide student-athletes to graduation. Schools can also now earn "academic achievement units" each year if they meet certain qualifications such as 90% graduation rate, academic

						academic policies.	progress rate of 985 or better and be 13% points higher than general student body graduation rate.
Kaier, Zanotti, Davis, Strunk & Cromer	Addressing the Problem of Student-Athlete Sleepiness: Feasibility of Implementing an Interactive Sleep Workshop at a Division	Journal of Clinical Sport Psychology.	The purpose of this study was to investigate the feasibility and effectiveness of brief sleep workshops for student-athletes.	152 Division I student-athletes completed a questionnaire on sleeping habits/knowledge. Subjects attended a workshop then a follow up two weeks later. A third	Data was collected and entered as an independent variable with 3 time points: baseline, follow up 1 and follow up 2.	Knowledge of sleep increased from 39.8% to 82.5%. 51% reported at least one new sleep behavior. Athletes reported less daytime sleepiness and increased daytime	Participants found the study informative and motivating. There was a retention of sleep knowledge identified from the initial baseline time point to the first follow up. No changes were seen in overall sleep quality. Future studies should use non-biased subjects

	I School.			follow up was done at three or four months , depending on availability .		functioning.	with a more fitting time schedule, some subjects were lost before the 3rd follow up due to scheduling conflict.