An Investigation in to whether a correlation exists between an individual's socioeconomic status and levels of dropout from physical activity

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Abstract

Physical activity is essential to an individual's health, and it is of concern within Northern Ireland that many are not meeting the recommended daily levels of activity laid out by the World Health Organisation (2011). As a result many are not gaining the health benefits that correspond to partaking in physical activity regularly. The issue of socioeconomic status is often discussed in research into physical activity, and it has been suggested that socioeconomic status can affect the sporting participation of an individual.

This study was completed in order to determine if a positive correlation exists between a pupil's socioeconomic status and their levels of dropout from physical activity.

The study sample for this investigation included 115 subjects, 58 males and 57 females. The subjects consisted of Primary 6 pupils, aged 9-10 years old. The pupils attend five primary schools across Northern Ireland, in a range of rural and urban environments.

A pupil questionnaire was used to collect the data for both variables. Parental occupation was used as a gauge of the average household income which in turn was used to determine socioeconomic status. The pupils were also asked to complete a questionnaire on their current participation in physical activities, and the activities they have dropped out of. The results showed no correlation present between socioeconomic status and dropout from physical activity.

It is the aim of the author to highlight the need for equal opportunities to be presented to individuals of all socioeconomic backgrounds in the hope that participation in physical activity will increase, thereby decreasing dropout levels. In turn this will have health benefits as more individuals will be achieving the recommended levels of daily physical activity.

Key words

Physical activity; Socioeconomic status; Dropout.

Introduction

Background to the Study

Within today's society, social class frequently presents itself as an issue of concern with regards to physical activity participation. As concluded by Lunn (2004), Green (2000), and Dagkas (2016), the provision of physical activities is not equal between all classes in society. The participation levels are frequently noted to be higher for those who are the higher earners in society, and so part of a higher social class. It has been recognised that those in the lower social classes spend a larger proportion of their time in inactivity than those in the middle and upper classes due to the fact that physical activities and sport cannot be continued on into adulthood. Various reasons have been the cause of this, be it financial incapability, lack of facilities, or lack of opportunity.

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Social class is particularly prevalent as a barrier in the types of activities participated in by people of different social classes. There are a number of sports, which appear to be unreachable by the lower classes due to the finances needed to participate. These costs tend to be particularly for equipment, club and membership fees.

Need for Study

From reviewing literature, there have been numerous studies which have investigated socioeconomic status and pupil education, and also, to a lesser extent, the participation levels of pupil's from varying social classes in physical activity. However, there is a lack of research to date investigating the correlation between socioeconomic status and dropout from physical activity. Many pupils in schools are not at present achieving the recommended, 'at least 60 minutes of moderate- to vigorous intensity physical activity daily', which has been laid out by the World Health Organisation (WHO) (2010), and also the Irish Department of Health and Children (DHC) (2009). At present, only '19% of primary school children' (Woods et al., 2010) met the physical activity recommendations.

It is expected that this research will strive to highlight that an inequality of provision of physical activity and sporting opportunities exists across social classes in today's society. This is an issue which needs to be addressed, and is the responsibility of the government to ensure that participation levels increase, and are equal throughout social classes. It is the hope that if the participation levels were to improve across all classes, the dropout rate would decrease, resulting in a population which is more physically active. This is desirable, as it has been found through studies conducted by the DHC that those who meet the 'physical activity recommendation of > 60 minutes of MVPA daily had the best health profile of all children.'

Aims and Objectives

The aims and objectives of this paper are to investigate any potential relationship between socioeconomic status and dropout levels from physical activity. The area of socioeconomic status is one which has been widely studied with regards to pupils' education, whereas the link to dropout from sport has not been extensively documented. Research has a tendency to examine the link between socioeconomic status and sporting participation, as opposed to dropout.

Data were gathered from approximately 125 subjects from 5 schools across the Northern Ireland library boards. Socioeconomic status was determined for each pupil by finding the occupation of each parent, and then determining a household income based on the average salaries of each occupation. The household income was subsequently used to determine the socioeconomic class of the pupil according to the Great British Class Survey (2013).

The pupil's current activity levels, dropout levels, and parental occupations were collected through the implementation of a questionnaire.

To analyse the collected data, the researchers used Microsoft Excel to provide clear graphical representation of the results and display correlations, if they are present, between the two variables. The results will then be discussed and conclusions of the study will be derived.

Literature Review

Dropout of Sport

Dropout is defined by Collins as 'to abandon or withdraw from (a school, social group, job, etc)'. This study will specifically be referring to the dropout of sport. One of the earliest attempts to characterise dropout of physical activity was made by Massie and Shepard (1971). Their study into dropout of sport showed that both physiological and psychological factors were both present in

explaining the reasons for an individual's discontinuation of physical activity or sport. These factors included body type and body fat percentage, personality traits and self-motivation (Biddle, 2007). Physical activity is defined by the World Health Organisation (2011) as 'any bodily movement produced by skeletal muscles that requires energy expenditure', and this includes anything from sport to many activities people often would not think of such as household chores. In accordance with the WHO (2011) children and adolescents (aged 5-17) should undertake 'at least 60 minutes of moderate to vigorous-intensity physical activity daily'. Any additional activity beyond this will benefit the individual's health further. The term "physical activity" should not be confused with "exercise", which is a subcategory of physical activity that is planned, structured, repetitive and aims to improve or maintain one or more components of physical fitness. Both, moderate and vigorous intensity physical activity brings health benefits.

Gender is a particular variable which is often noted in literature relating to drop out (Allender et al., 2006). A study conducted by Sport England (2011) suggests that across all sports, nearly half as many 16-24 year-old women take part in sport, in comparison to men of the same age. Also in the UK, only 15% of girls of the age 15 meet the recommended physical activity levels. The child's experience within sport is crucial for their ongoing development. If their experiences are positive then it is likely that the participation will continue, however if it is negative, then they are more likely to lose interest in physical activity and dropout.

Within Northern Ireland, according to Sport Northern Ireland (2011), 82% of parents believe their child is getting the recommended daily amount or more of physical activity, but in reality less than a quarter (24%) of 9-11 year olds take part in the recommended 60 minutes of physical activity, 7 days a week. Therefore, there appears to be a huge contrast between the parent's perception of their child's level of participation in physical activity and their actual levels of participation.

Physical activity is widely regarded as a major contributor to both physiological and psychological health. Participation in physical activity contributes to improved psychological well-being as it can reduce stress, anxiety and depression and consequently substantial mental health gains may be achieved by adopting a habit of regular exercise (Martinsen, 2008). This can in turn aid physiological health as reducing issues such as stress will play a vital role in the management and prevention of cardiovascular disease (Warburton, 2006). As of 2013, according to the WHO, the number of children below the age of five who are categorised as obese stood at 42 million. Almost 75% of these children were in the developing countries. Overweight and obesity, and their relevant diseases, are largely preventable, and as a result the WHO has placed a high priority in combatting the issue with an increase in physical activity being a major component in the solution.

Participation within sport for children has been found through studies to be more enjoyable when they are not forced to compete and win, but rather are prompted and provided with the opportunity to experiment with a range of activities. An investigation into youth sport (Butcher et al, 2002) specified the lack of enjoyment to be the prominent reason for the transfer from a sport, or even the complete withdrawal from all form of sport. Woods et al. (2010) suggests that this lack of enjoyment can be attributed to excessive pressure being felt by the child from family members, coaches and themselves due to the competitive nature of sport and the performance results being focused on instead of the mastery of the skill. The child's enjoyment diminishes as a result, and consequently they may end up dropping out of the sport entirely.

The increase of sedentary lifestyles is another factor which plays a vital role in the dropout levels of children. A recent UK study (Zollinger-Read, 2013) showed that only 51% of children achieved the recommended one hour of exercise per day, with boys (63%) being far more active than girls (38%). Also, it was discovered in the work of Zollinger-Read (2013), that most British children first get a

mobile phone by the age of 12 years old, with 10% getting a phone by the age of 5 years old. Research completed by the Robert Johnson Wood Foundation (2014) highlighted the fact that both the amount of time spent daily in sedentary activities, and also the percentage of youths engaging in excessive sedentary time have both increased in recent years. This trend influences the dropout rate of children as they are spending more time in front of screens (TV's, computer, mobile phones and video games), and less time being physically active as supported by the Robert Johnson Wood Foundation (2014) where it states that, '…sedentary activities may displace time for being physically active'.

The Relative Age Effect (RAE) is a factor which is also prevalent in children's dropout from physical activity. It is based around the idea that child born later in the school year will experience less success due to their less developed physicality than those born early in the school year. Due to this, they are less likely to be selected for teams due to their lesser physicality and athleticism. Once adulthood is reached this factor is nullified as each individual will have fully matured, however, many individuals will not persist with the sport until adulthood due to the decreased opportunities for participation throughout childhood and adolescents (Begley, 2015).

The issue of early specialisation is a factor in the dropout of young people from physical activity and sport. Early specialisation has the potential to limit overall motor skills acquisition (Wiersma, 2000), and as a result, potentially reduce long term involvement in physical activity due to the decreased likelihood of taking part in alternative activities. In addition, injury can also cause dropout of physical activity, and frequently this is caused by early specialisation due to the overtraining of an individual. It is advised that a child should train a maximum of 5 days per week within a sport and also, children should have two to three months off training per year to allow recuperation of their bodies. This is frequently not adhered to, and injuries can result. Injuries are particularly prominent in the adolescent years when growth spurts occur (Baker, 2003). The most damaging point in relation to early specialisation is the lack of enjoyment which consistently identifies itself as a major motive for the discontinuation of physical activity.

The work of MacPhail (2003) found that the provision of different types of sporting opportunity is likely to increase participation due to the varying preferences that each individual may have. This notion is also known as 'sampling', and is defined by Côté (2007) as 'engaging in a variety of sports during childhood'. It should be noted that the child may be engaging in multiple activities and therefore dropping out of one activity will not result in complete inactivity, but rather participation in a reduced number of activities.

It has been well documented throughout a number of studies that high levels of physical activity in childhood (especially aged 9-18 years) is likely to endure into adulthood as cited by Ridgers et al. (2007) where he states '...an active lifestyle during childhood reduces the risk of health problems in later years, and that levels of physical activity during childhood track into adulthood.' The correlations found in the study were only low to moderate, however, it is believed that participation in physical activity at a young age will influence adult activity levels and therefore the health levels of the population.

Socioeconomic

Socio-economic status involves both social and economic factors. Mueller et al. (1981) defined it as 'the relative position of a family or individual on a hierarchical social structure, based on their access to or control over wealth, prestige and power.' Within the United Kingdom, a model of the seven social classes is used to describe the social status of every individual, and this model encapsulates the entirety of the population. Prior to 2013, the three traditional social classes (upper, middle and working) were believed to only be relevant to 39% of the population at that time. It was traditionally

believed that class only encompassed an individual's occupation, wealth and education, but this was argued to be too simplistic and that the three dimensions of economic, social, and cultural should all be studied. The Great British Class Survey was conducted by the BBC in 2013, in which over 161 000 people took place in to ascertain the new social classes. The BBC Lab UK accounted for economic capital (income, savings and house value), social capital (the number and status of people an individual knows), and cultural capital (the extent and nature of cultural interests and activities).

The seven social classes are:

- Elite
- Established Middle Class
- Technical Middle Class
- New Affluent Workers
- Traditional Middle Class
- Emergent Service Workers
- Precariat

(See Appendix A)

The new class system provided a much more distinct picture of Britain. There will always be the wealthy and poor extremes within the population, but the groups in the middle are those which provide an insight into the continuous development of modern Britain. The development of the new class system also allowed the government to identify the location on average of each class and where the highest concentrations of each class is based. For example, they can now identify where the precariat class is in a high percentage, and initiatives and resources can be distributed to cater for the needs of the people with greater efficiency.

There are many measures of socioeconomic status. Friedman's permanent income hypothesis (1957) suggests that measuring a family's income or expenditure is an excellent indicator of socioeconomic status. However, Hentschel & Lanjouw (1996) noted that collecting data for income can be difficult, especially within developing countries. It has been found that questioning families on their income proved to have a higher level of 'non-responses' than other questions of socioeconomic status. This is due to an individual's income being viewed as a very personal matter and therefore it is a sensitive issue (Shaver, 2007). Expenditure however has been found to be much easier data to collect and is proved to find an accurate gauge of socioeconomic status.

An individual's education can also be used in determining socioeconomic status and it has been frequently used due to its potential to influence the occupational and earning opportunities in the future (Shaver, 2007). Furthermore, individuals with a higher education are more likely to be found incorporating health promoting behaviour and often have better work and economic conditions in their everyday lives (Shaver, 2007), therefore enhancing their socioeconomic status.

The study of an individual's occupation is a good medium to derive other factors within their life such as; level of education, income, access to certain facilities in society and levels of social interaction and cultural diversity (Vereecken, 2003). The use of open-ended questions when questioning children about their parents' occupations has been recognised as providing valid data in the classifying of their parent's socio-economic status (Lien et al, 2005). However, this is in direct opposition to the findings of the World Health Organization (WHO) in the Health Behaviour in School-aged Children (HBSC) Survey as it is proposed that 20% of children are incapable of providing sufficient information about their parents' occupations (Currie et al, 1997). Shaver (2007) however viewed parental occupation as a viable means of determining socioeconomic status, as it is a much less volatile than questioning a family's income.

Socioeconomic Links to Dropout

Studies have shown that there is a direct correlation between socioeconomic factors and dropout rate of physical activity. It is noted by Lunn (2004), that disadvantage begins to affect children's participation in physical activity from a very young age. He commented that primary schools that have been classified as 'disadvantaged' offer both 'less extra-curricular sport to their students and a narrower range of sports'. This will in turn lead to increased dropout levels, as when children become disenchanted with one of the few sports that is available to them and discontinue their participation, there are limited opportunities for them to engage in another sport that may appeal to them due to the lack of variety available to them.

Within the UK schooling system, it has been proven that children coming from a lower socio-economic status who attend more affluent schools, are more likely to drop out from physical activity and be less physically active than their fellow pupils (Moore et al, 2015). It was suggested by Green (2000) that parents exert a strong influence on the types of physical activity opportunities that are provided within schools, and therefore, the more affluent school would tend to offer sports that children from a lower social status could not afford to participate in regularly.

A further factor suggested for dropout in physical activity by children attending more affluent schools is that they may have to travel further to reach the schools which takes away from the time they may have to avail of physical activities (Moore et al, 2015). As a result of this, any activities that they were participating in are likely to be discontinued once the school year begins and time restrictions are an issue.

Sport is ideally suited to engage disadvantaged children and foster beneficial development (Dagkas and Burrows, 2016), yet sport is not always afforded the opportunity to do so. In cases where the government identify areas of low socio-economic status and provide funding as a result to subsidise the cost of children's participation in sport, it is rarely enough to cover the full cost of the participation. In many scenarios like this, these low-income parents simply cannot afford to cover the cost of the continued participation and the child 'dropping out' of the activity is the only available option (Holt et al., 2011). Lunn (2004) supported this with his findings, which have shown that approximately one third of adults in Ireland are physically inactive at present as the results are heavily skewed towards people of lower socioeconomic status.

The role of parents is a contributing factor to the children's levels of participation in physical activity and the social class of the parents can influence the degree to which their child's participation is affected (Evans et al, 2010). The ability of parents to transmit the interest in physical activity to their children is more prominent when the parents are of a middle class background (Dagkas et al., 2016). This means that those children coming from a more disadvantaged background are less likely to be encouraged to take part by any parental involvement in physical activities and the physical activity levels of those from a lower social class will only decrease.

Finally, physical inactivity in the UK costs the NHS a total of £1.06 billion per year in direct costs. This is a figure which can be reduced easily if the number of physically active members of the population were to increase. A work based physical activity programme on average would save a company £10,941 after costs (NICE, 2012), due to reduced absenteeism. However, the most effective way to combat this issue would be to reduce the levels of dropout within children and adolescents. This would therefore increase the likelihood of continuing physical activity into adulthood and this would be beneficial as physically active workers take 27% fewer days off due to illness (NICE, 2012).

Methodology

Research Design

This research study aims to achieve a quantitative assessment of children's dropout from sports and physical activity, and how this may be affected by their socioeconomic status in society. Research is often referred to as being either quantitative or qualitative in nature. Quantitative research is 'the numerical representation and manipulation of observations for the purpose of describing and explaining the phenomena that those observations reflect.' (Sukamolson, 2005) It has been concluded that quantitative data is the most appropriate means of data collection for this investigation.

It is vital that the results gathered are as accurate as possible. Each individual will be given a questionnaire which will determine their current number of activities participated in, the number of activities which they have dropped out of in their lifetime, and also the occupation of each of their parents. The pupils will each be given adequate time to respond to each of the questions in the questionnaire and the researcher will ensure that all of the questions are thoroughly answered.

Distributing the questionnaires to pupils as opposed to parents is for a number of reasons; Firstly, it was reported by Vereecken (2003) that parents are not better reporters of their economic activities due to the fact that they may phrase their activities in a 'more attractive perspective'. Also, Vereecken (2003) discovered that children at an approximate age of 11 years can be viewed as an appropriate means of determining their parental occupations. Therefore, it has been concluded that the written questionnaire, given to the Primary 6 classes should provide data which can be interpreted by the researchers to determine the socioeconomic status of each child. Ideally, the questionnaire would have been distributed amongst Primary 7 pupils, but it is the opinion of the researcher that this would be the cause of too great of a disruption in the build up to the pupil's 'Transfer Test'.

Subjects

The study sample is made up of 115 participants, all of whom attend primary schools throughout Northern Ireland. The sample contains 58 males and 57 females, and all of the pupils are in Primary six (9/10 years old).

Procedure

To guarantee that the research carried out would be ethically appropriate a number of factors must be taken into consideration. The procedures put in place reflected the guidelines put forward by the British Psychological Society (2014); the aims and benefits of research will show respect to all involved in the gathering of data. Through the use of issuing a subject code, each individual will be guaranteed 'confidentiality, anonymity, and non-traceability in the research' as outlined by Cohen (2007).

Prior to initiating the study, the researchers have to ensure that the both the school's and parental consent has been granted to allow the study to progress. The principal of the schools was contacted first to ask if the study would be participated in by the school. The letter explained the purpose of the study and exactly what it entailed. The Primary six pupils were given consent forms which had to be completed by their parents and returned to the class teacher within a two week period. The researcher only completed the study with the pupils who receive parental approval. The results obtained from the questionnaires were collected and used as outlined in the letter. Any information regarding individual pupils or information regarding the schools was dealt with in complete confidentiality.

Test

Testing Measures for Socioeconomic Status

Pupil questionnaires were used to collect information on the parental occupation of each child's parents. The method of giving out parental questionnaires was considered but it was concluded that this method would run the risk of too many 'non responses', potentially resulting in an unfair distribution of social classes among the respondents. The research completed by Lareau (2000) supported this idea as it states, '...teachers report making more – not fewer – requests for parental involvement to working-class and lower-class parents than they do to middle- and upper-middle-class parents.' The respondents were therefore likely to be those who are not in the lower social classes. The 'Wisconsin Model' (Sewell and Hauser, 1980) strives to describe the reasoning for the gaps in parental involvement between classes. It proposes the idea that socioeconomic status shapes a parent's values, and the value placed on education is lower within the lower socioeconomic classes. This in turn impacts the motivation of the parents to provide support for the children's learning, and the child's motivation deteriorates consequently (Lareau, 2000). The results were then analysed and an average salary assigned to each occupation. The total family income will then be calculated and used to determine the class that each child belongs to.

Testing Measures for Dropout from Physical Activity/Sport

The other variable within the study is the number of activities dropped out of. Pupil questionnaires were given to Primary six pupils, and completed with the researcher as a guide, to ensure that all aspects of the questionnaire were understood and answered accordingly. This quantitative data was then be collected and sorted according to social class groupings to provide the results to the study.

Statistical Analysis

In order to determine if there is a correlation between the pupil's socioeconomic status and levels of dropout from physical activity, Microsoft excel was used to formulate graphs representing the data and showing averages regarding the statistics.

Results

Introduction

This chapter details the findings of the 115 subjects under investigation to assist in the overall purpose of this study. The aim of this study is to investigate the existing relationship between children's drop out from sports and activities and their socio-economic status, determined through parental occupation, in Key Stage 2 (KS2). Data were collected and recorded through the use of pupil questionnaires, to determine the extent of drop out, and socio-economic status. All of the data were collected over the course of one day for each of the five schools which participated in the study. The researchers completed statistical analysis through the use of an average salaries chart (Reed, 2016) to rank each parent's occupation accordingly, and then match this salary to the corresponding socioeconomic status. To determine which social class each family belonged to, the total average salary was found, and then this was compared to the data collected from the Great British Class Survey (BBC, 2011) which showed the average earnings of each social class. This survey was the most recent and up-to-date survey in Britain so it was believed that this would provide the most accurate representation of the modern day class system. When analysed, the results should provide an insight as to whether there is a case to suggest that drop put is impacted by the socioeconomic status of the child.

Subjects

The subjects involved in this investigation were Key Stage 2 pupils in Primary 6. There were 115 subjects (n=114), 58 of which were male and 57 of which were female. The subjects attended 5 different schools in Northern Ireland and were from different socio-economic backgrounds.

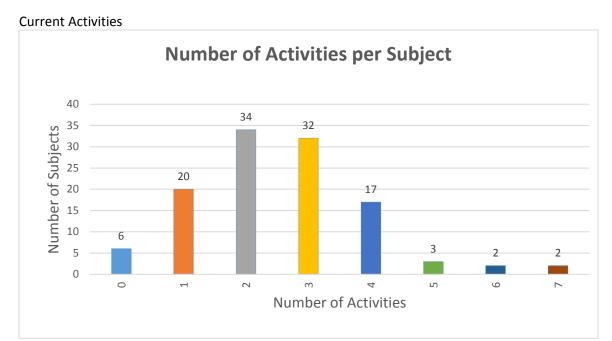


Fig. 1. The number of activities that are participated in per subject.

From the sample population a total, the 115 subjects engaged in 300 activities, with the average number of activities each engage in being 2.53. Only 5% of the subjects in question did not take part in any activities, meaning that 95% of the subjects currently engage in 1 or more activities. The least common is for a subject to take part in 6 or 7 activities with each having less than 2% of the subjects in their bracket. These subjects who participated in no sporting activities are potentially to be involved in non-active extracurricular activities such as music based activities and art and drama. These can frequently require quite a lot of time to be devoted to them through practice. This notion is supported through the work of Howe et al. (1998) as he states that within the learning of music, 'training and practice are the real determinants' of becoming a talented musician.

The most common occurrence within the subjects is for them to participate in 2 activities with 30% falling within this bracket and with just over 17% taking part in only 1 activity. This could be due to the issue of increasing early specialisation. This is quite an alarming figure as early specialisation is discouraged for young people due to the potential of leading to a lack of enjoyment. Butcher et al. (2002 [cited in Baker, 2003]) found that during the early stages of early specialisation in a particular sport, 'lack of enjoyment was the most important reason' for sporting dropout or transfer to another sport. Furthermore, another contributing factor to drop out of sport due to specialisation is presented by Hecimovich (2004) where it is noted that many sport programmes are now requiring 'higher levels of investment from early ages' and therefore discourage children from continued participation in a diverse range of activities.

Additionally, 49% of the subjects currently participate in 3 or more activities showing a good range of sports being experienced. These subjects can be categorised as 'sampling' sports, as they are not narrowing their field to experience an individual sport. The benefits that come with this sampling of a number of different sports are that the subjects will 'learn emotional, cognitive and motor skills through deliberate play activities and involvement in several sports.' (Côté, 2009) Later in life by the time they reach adolescence, they will have developed fundamental movement skills, coinciding with their cognitive and emotional skills that they have achieved (Côté, 2009).

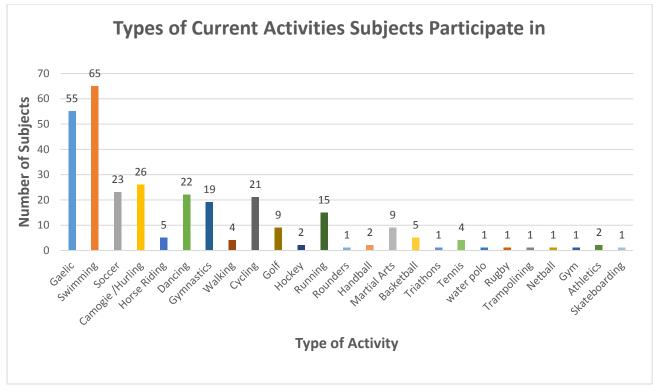


Fig 2. The number of pupils participating in each activity.

The data shows that Gaelic and swimming are the two most participated in activities, with 52 and 68 participants respectively. It can be noted that within the school setting, these are seasonal activities which only occur for a number of months at a time, due to factors of the weather and timetabling issues. Therefore, it is likely that pupils adopt another sport to play throughput the year, so that they do not completely stop participating in extracurricular activities.

Furthermore, the fact that local Gaelic and swimming clubs tend to have such close links to the local schools means that children will be more likely to participate in the activities outside of school as they have been given the chance to experience them. The close links between the clubs and the school mean that these sports are made much more accessible for the children, as discovered in a study conducted by Eime (2009) which found that commonly in club based participation, their membership began through an interest in the 'continued participation' of a school-based programme.



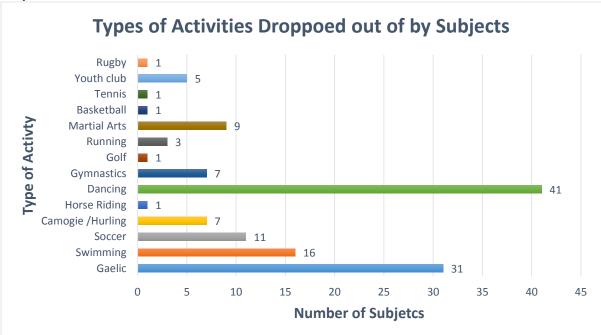


Fig.3. The number of subjects that have dropped out of each activity.

Gaelic football has a very high level of dropout, with 31 subjects dropping out of it in total. The likely explanation for this is due to the initial participation numbers were very high, so it is inevitable that a considerable number would eventually discontinue the sport. GAA in Ireland is rooted in the tradition and culture of the country, with almost every village in the country having its own GAA club. GAA sports (Gaelic and Hurling) have 'by far the highest participation rates in sports in the country' (Reilly, 2008). The factor of parental influence has a dramatic effect on the participation levels for children at an early age, as parents who have played the same sport in their lifetime will affect the levels of encouragement children receive to get involved in the same sport (Lunn, 2006). It can be assumed therefore that a number of the participants in early years were almost 'forced' to attend the Gaelic, and were eventually allowed to discontinue the sport once they had signalled their feigning interest in it.

The most notable levels of drop out are in dancing, with a total of 41 subjects discontinuing it. Considering the fact that there are only 21 subjects still partaking in dancing, this means that almost two thirds of the pupils who take up dancing in their childhood have dropped out of it by the age of 10 years old. A reason affecting the high levels of drop out is the fact that a high number of these subjects will be taking part in Irish Dancing, which is largely competition based, even from a young age. This early exposure to competition can lead to a focus being on winning rather than improving and therefore mastering the skills of the sport. If the subject then experiences failure, it can lead to a loss of confidence and therefore a lack of enjoyment, which will ultimately lead to drop out of the activity. The effect of being exposed to such failures was examined in the work of Vallerand (1986), who found that subsequent to experiencing this failure in a competitive scenario, a young person then displayed a reduction in their intrinsic motivation, resulting in their drive to play and succeed in the sport being reduced also. There is a great need for these sports which are often competition based from a young age to strive to provide the opportunity for fun and enjoyment without competition in an effort to achieve a higher proportion of lifelong participation in the sport (Allender, 2006).

A number of sports had no subjects dropping out from the sport, such as cycling. With 20 pupils currently participating in cycling, it is very positive to see that none have dropped out. A major contributor to this factor is the fact that cycling is very much a lifelong skill, which is largely participated in in a non-competitive setting, resulting in no pressure to achieve being placed on the pupil. Competition cycling is very uncommon in children and it is only later in life where competitive cycling would be adopted. The focus is solely on fun and enjoyment, and the case has been put forward that focusing on making sport fun will 'enhance the attitudes of young people towards physical education, and ultimately physical activity participation' (MacPhail, 2008), and thereby reduce the chances of drop out occurring.

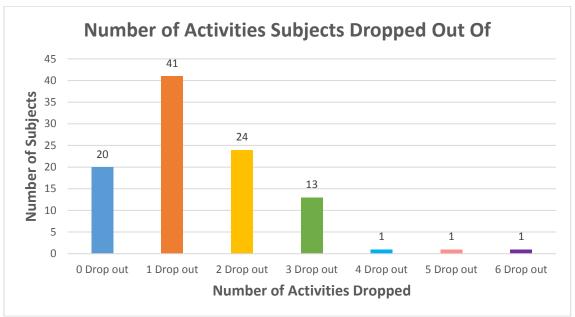


Fig. 4. The number many activities each subject has dropped out of.

Figure 4. illustrates that the number of subjects who dropped out of 4, 5, or 6 activities was very low, with only 1 subject being present in each group. This is due to the fact that vast majority of the pupils take part in between 1-3 activities, with very few taking part in more than 4 activities (7%). Therefore, it is uncommon for the subjects to take part in more than 4 activities, so dropping out of 4 or more is very unlikely.

The mode drop out amount is 1 activity, with 41 subjects in this category. This is proceeded by 2 activity drop outs with 24 subjects, and thirdly is zero drop outs with 20 subjects in this category. The reasoning behind the three largest groups being 0, 1, and 2 drop outs is that the process of sampling is most likely occurring as the subjects are all still in childhood. The sampling of activities is promoted in childhood years as it provides an individual with improved all-round co-ordination and underlying skills (Fransen et al., 2012). It was reported in a study conducted by 'The Journal of Sports Sciences' (2012) that when athletes were tasked with undertaking a new skill that the 'athletes who required fewer hours of sports-specific practice to attain expertise had participated in many sports activities prior to reaching an expert level' (Fransen et al., 2012), and so further promoting the idea of sampling activities at a young age. The study also proved that the effects of sampling often do not manifest themselves until later in life, towards the adolescent's stage, so the undertaking of sports even beyond childhood could still prove to provide the opportunity for lifelong participation in an activity and therefore provide many great health benefits for an individual.

Social Class

Table 1. Table indicating occupations typical of the social class group.

Elite	Established Middle Class	Technical Middle Class	New Affluent Workers	Traditional Working Class	Emergent Service Workers	Precariat
Chief Executives Marketing and Sales Directors	Electrical engineers Occupational Therapists	Aircraft pilot Pharmacist	Electrical and electronic technicians	Lorry drivers Electricians	Bar staff Chefs Assistants	Cleaners Van drivers Unemployed

The typical jobs within each social class can be used to deduce the average salaries that the people incur. The salaries were based on the UK average (see Appendix A). The household income was calculated and the total was the basis of the classification of the subjects into the corresponding classes. The seven social class have a huge range of household incomes, ranging from an average of £89,000 (Elite) to £8,000 (Precariat).

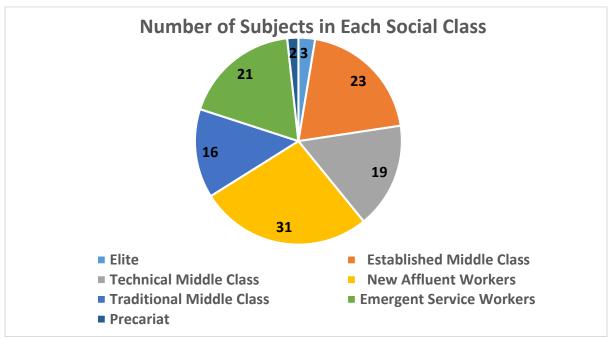


Fig. 5. Breakdown of which social class the subjects belong to.

In this study the average social class was 3.9 (social class 4 being 'New Affluent Workers'), with the mode social class being New Affluent Workers also, with a total of 27%. This indicates that when calculated, the average household income was approximately £29,000 \pm £4,000. The two extremes of the class system, elite and precariat, had the smallest representation in the study, with only 3% and 2% respectively.

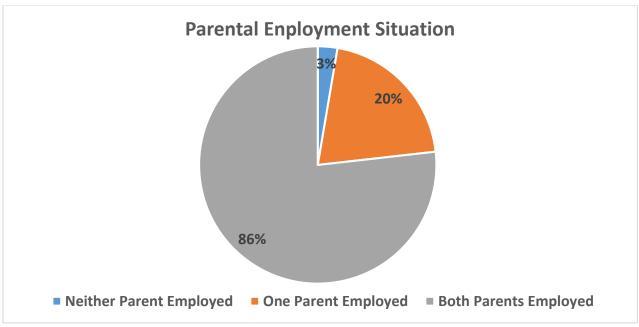


Fig. 6. Subjects parental employment situation.

According to the Northern Ireland Statistics and Research Agency (NISRA), the unemployment rate in Northern Ireland stood at 5.7% as of October 2016. This is not the case presented through this study, with the total number of parents unemployed in this scenario stands at more than double this figure at 12.6%. However, it cannot be ensured that all of the 115 subjects had both parents present as this question was not asked on the questionnaire due to sensitivity issues. Most recent figures show that almost 25% of children in the UK are currently living in single parent households (ONS, 2016). It should be noted however, that even if these figures were allowed for, the unemployment figures would still be well above average, which could be down to the demographics of the schools in the study.

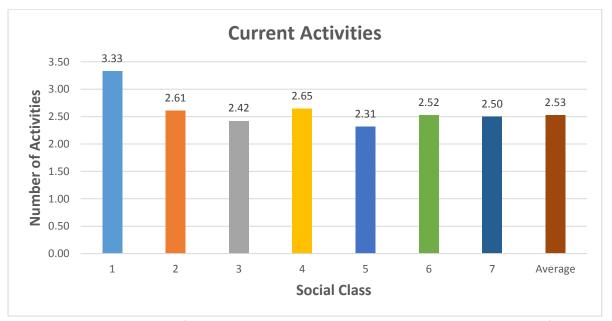


Fig. 7. The average number of current activities participated in by each social class group of subjects.

The previous data shows that the subjects in the elite social class have the highest levels of participation in current activities with an average of 3.33. The traditional working class participate in

the lowest with 2.31 activities on average per subject. The average number of activities across the sample was 2.53 per subject. The elite social class tend to have higher levels of participation due to the higher levels of money available to them. Individual sports are frequently viewed as 'too expensive' by many families, due to the inevitable finances required to participate.

Sports such as tennis and golf fall under this bracket and they are sports which are frequently inaccessible to a large portion of the population based solely on their income. Research conducted by Steenhuis (2009) showed that it frequently is the case that people with a middle level income often cannot afford to partake in individual sports due to the financial costs incurred through the 'memberships, clothing and equipment' (Steenhuis, 2009). As a result, only those with higher level incomes, i.e. those who are in the highest social classes will be able to afford with the financial pressures of these sports, therefore widening the range of sports that these subjects will have access to. The pupils in the elite class will therefore have the opportunity to access additional sports which children of the lower income social classes cannot.

For the lower social classes, the draw towards team sports is much more realistic due to the relatively low cost incurred through their participation. Pedersen and Seidman (2005) noted that 'Team sports were found to be the most popular activities' participated in by low income youth in an urban area when examining the type of sports participated in, thereby furthering the claim that team sports are within the financial reach of all members of a community, regardless of socioeconomic status.

Activities by Social Class

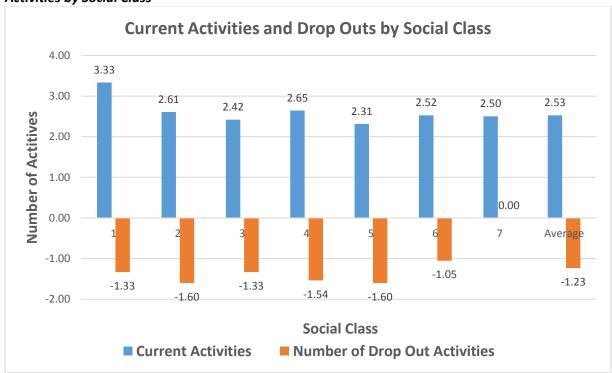


Fig. 8. The current number of activities participated in, and the number of activities dropped out of, according to each social class.

Overall the results demonstrated that there is no clear correlation between the number of activities participated in and the social class of the subject. The issue of accessibility does not seem to be an issue amongst the majority of the subjects (excluding the elite social class) as they all participate in an average of 2.31 to 2.65 activities. This could be due to the projects being put in to action

throughout the UK, and right here in Northern Ireland. Organisations such as Sport NI have projects in place such as 'The Facility Fund' which strives to overcome under representations within sport participation through increasing participation in communities, with one aspect of its target groups being 'people living in the areas of greatest need'. This project is striving to increase the participation levels throughout the country by investing at least £17.5 million into facilities over the next five years. The idea of projects like these is to create as many new facilities for communities and clubs as possible so that all members of each community have the opportunity to avail of them and increase physical activity levels. Due to projects like the forementioned being enacted in communities throughout the country, pupils do not have to drop out of the sport due to financial reasons, and the participation levels throughout the classes can remain equal. This explains both the participation levels and the drop out levels being very similar across the board.

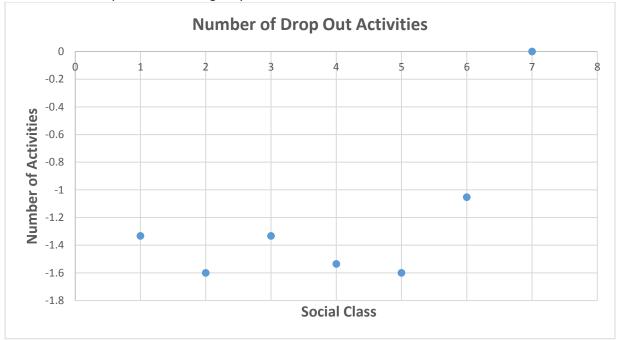


Fig 9. The average number of activities dropped out of by subjects of each social class.

The graph above shows that the precariat social class has the lowest drop out rate, with zero drop out activities, however, it should be noted that there were only two subjects in this social class in the entire study so this number will likely not be an accurate representation if it was conducted on a larger scale. This result can therefore be assumed to be an anomalous result.

The social class with the second least number of drop out activities is the subjects belonging to the 'Emergent Service Workers'. This social class has a drop out rate of 1.05 activities. The remaining five social classes have drop out rates which fluctuate between 1.3 to 1.6 dropped activities. A reason for the 'Emergent Service Workers' category having the lowest drop out rate (disregarding the anomalous result) is that parental influence may be present in many of the cases. The 'Emergent Service Workers' social class has the lowest average age, at 34 years old, and therefore these parents are the ones who are more likely to still be involved with sports teams and clubs. It was presented by Pugliese (2007) that 'parent support and direct help from parents' can be consistently associated with their child's physical activity levels. And this was further reinforced through the work of Baxter-Jones where it is stated that 'the home is the most important influence on a young person's capacity to be successful' (Baxter-Jones, 2003). Furthermore, within a household which contains parents who have an active interest in sport, the child's interest and participation is more likely to be fostered through the encouragement from their parents and their willingness to supply

aid to them, be it through transportation, time devoted for practice, or expenses (Baxter-Jones, 2003).

Overall, no significant trends presented themselves linking socioeconomic status to dropout throughout the analysis of the study. The study is of a relatively small scale, and to reach a more conclusive result on the relationship between socioeconomic status and dropout from physical activity.

Conclusion

Following on from research and data analysis, there is no correlation present between dropout of physical activities and socioeconomic class of pupils. The Great British Class Survey (2013) was used to determine the social class of each individual, and the average number of dropouts per social class was calculated. No significant trend or correlation presented itself. However, it was found that those in the highest social classes part take in the most activities, and those in the lower classes have dropped out of less activities. Further study is required in order to come to a more comprehensive conclusion of whether a correlation exists between the two variables.

The literature directly linking socioeconomic status to dropout from physical activity does not appear to exist. However, the work of Steenhuis, (2009), Holt et al., (2011) and Lunn (2004) all support the notion that an individual's socioeconomic status plays a role in the types of activities that they will be capable of availing themselves of, and that particular activities will not be able to be continued beyond a certain point due to financial challenges.

It is the aim of the author that this research will highlight the need for the government to play a role in bridging the gap between the social classes in relation to opportunity for participation throughout the range of sports available in society at present. To achieve this, more projects will need to be enacted such as the 'Facility Fund Programme' which is currently put in place by Sport NI. Such projects will help to encourage greater participation through the ease of access, both through having facilities local to the individual, and through removing the financial barriers which may come with participating in some sports for some members of society. The hope is that through the introduction of greater provision for all people in society, participation levels will be equal across all classes, with dropout levels reducing in the future due to continued participation.

Recommendations

Upon reflection of the investigation, a number of recommendations are advisable to produce a study with greater reliability. Gathering the data for the two variables; 'physical activity dropout levels', and 'socioeconomic status' are essential. In an effort to increase the accuracy and reliability of the socioeconomic status of the pupils, a parent questionnaire and a pupil questionnaire could be distributed so that the results could be compared.

Conducting further investigation with a larger sample size would also be desirable. As this would ensure the data collected is a more accurate representation of the structure of the social classes within society.

Limitations

There were a number of limitations within this study which affected the results of the study. The small scale nature of the study meant that the spread of social classes in the results was uneven. The number of pupils within each social class ranged from 31 pupils to 2 pupils. This means that if an anomalous result were to present itself, it will have much less of a significance in the class with 31 individuals, opposed to the class with only 2 individuals.

Another factor affecting the results was the non-return of parental consent slips from a number of pupils. As is believed by Lareau (2000), the pupils whose parents often take a keen interest on a child's education are those in the middle and high classes, not the lower classes. Therefore, it can be assumed that those pupils who did not return the consent slips are those of the lower social class families. In addition, a number of pupils were not sure of their parent's job meaning that the results may not be a true representation of their socioeconomic status.

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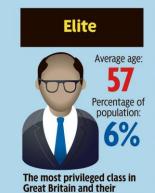
References

- Allender, S. Cowburn, G. and Foster, C. (2006). *Understanding participation in sport and physical activity among children and adults: a review of qualitative studies.* Health education research, 21(6), pp.826-835.
- Baker, J. (2003). Early specialization in youth sport: A requirement for adult expertise? High ability studies, 14(1), pp.85-94.
- Baxter-Jones, A.D.G. and Maffulli, N. (2003). *Parental influence on sport participation in elite young athletes.* Journal of sports medicine and physical fitness.
- Begley, K. (2015) *Drop out from youth sport; Responsibilities of the coach · the UK's leading sports psychology* Website. Available at: http://believeperform.com/coaching/dropout-from-youth-sport-responsibilities-of-the-coach/ (Accessed: 26 October 2016).
- The British Psycological Society (2010) Code of human reseach ethics. Available at: http://www.bps.org.uk/sites/default/files/documents/code_of_human_research_ethics.pdf (Accessed: 7 January 2017)
- Changing the game for girls (2012) Available at: https://www.womeninsport.org/wp-content/uploads/2015/04/Changing-the-Game-for-Girls-Policy-Report.pdf (Accessed: 6 January 2017).
- Cohen, L., Manion, L. and Morrison, K. (2007) *Research methods in education*. 5th edn. New York: Routledge Falmer.

- Côté, J., Horton, S., MacDonaldi, D. and Wilkes, S. (2009) 'The Benefits of Sampling Sports During Childhood', Education Database, 74(4), pp. 6–11.
- Côté, J., Lidor, R. and Hackfort, D. (2009) 'ISSP position stand: To sample or to specialize? Seven postulates about youth sport activities that lead to continued participation and elite performance', International Journal of Sport and Exercise Psychology, 7(1), pp. 7–17.
- Currie, C.E., Elton, R.A., Todd, J. and Platt, S. (1997) 'Indicators of socioeconomic status for adolescents: The WHO health behaviour in school-aged children survey', Health Education Research, 12(3), pp. 385–397.
- Dagkas, S. and Burrows, L. eds. (2016). *Families, Young People, Physical Activity and Health: Critical Perspectives*. Routledge.
- Davidson, R., Rutstein, S., Johnson, K., Suliman, E., Wagstaff, A. and Amouzou, A. (2007) *Socio-Economic Differences in Health, Nutrition and Population*. Available at:http://siteresources.worldbank.org/INTPAH/Resources/4003781178119743396/colombia.p df (Accessed: November 2016).
- Department of Health (2009) Available at: http://health.gov.ie/healthy-ireland/physical-activity/recommended-guidelines/ (Accessed: 10 January 2017).
- Eime, R.M. and Payne, W.R. (2009). Linking participants in school-based sport programs to community clubs. *Journal of Science and Medicine in Sport*, 12(2), pp.293-299.
- Fransen, J. Pion, J. Vandendriessche, J. Vandorpe, B. Vaeyens, R., Lenoir, M. and Philippaerts, R.M. (2012). Differences in physical fitness and gross motor coordination in boys aged 6–12 years specializing in one versus sampling more than one sport. Journal of sports sciences, 30(4), pp.379-386.
- Green, K. (2000). Extra-Curricular Physical Education in England and Wales: A Sociological Perspective on a Sporting Bias. *European Journal of Physical Education*, *5*(2), pp.179-207.
- Hentschel, J. and Lanjouw, P. (1996). Constructing an indicator of consumption for the analysis of poverty: Principles and illustrations with reference to Ecuador (Vol. 124). World Bank Publications.
- Holt, N.L. and Neely, K.C. (2011). *Positive youth development through sport: A review*. Revista iberoamericana de psicología del ejercicio y el deporte, 6(2), pp.299-316.
- Howe, M.J. Davidson, J.W. and Sloboda, J.A. (1998). *Innate talents: Reality or myth?* Behavioral and brain sciences, 21(03), pp.399-407.
- Lien, N. Friestad, C. and Klepp, K.I. (2001). *Adolescents' proxy reports of parents' socioeconomic status: How valid are they?* Journal of Epidemiology and Community Health, 55(10), pp.731-737.
- Lareau, A. (2000). *Home advantage: Social class and parental intervention in elementary education*. Rowman & Littlefield Publishers.
- Lunn, P. (2006). Fair Play?: Sport and Social Disadvantage in Ireland. ESRI.
- Macphail, A. Gorely, T. and Kirk, D. (2003). *Young people's socialisation into sport: A case study of an athletics club*. Sport, Education and Society, 8(2), pp.251-267.
- MacPhail, A., Gorely, T., Kirk, D. and Kinchin, G. (2008). *Children's experiences of fun and enjoyment during a season of sport education*. Research Quarterly for Exercise and Sport, 79(3), pp.344-355.
- Malina, R.M. (2001) 'Physical activity and fitness: Pathways from childhood to adulthood', American Journal of Human Biology, 13(2), pp. 162–172.
- Martinsen, E.W. (2008) 'Physical activity in the prevention and treatment of anxiety and depression', Nordic Journal of Psychiatry, 62(s47), pp. 25–29.
- Mueller, C.W. and Parcel, T.L. (1981). *Measures of socioeconomic status: Alternatives and recommendations*. Child Development, pp.13-30.
- NICE (2012) *Physical activity*. Available at: https://www.nice.org.uk/advice/lgb3/chapter/Costs-and-savings (Accessed: 26 October 2016).

- Public Health England (2013) Sedentary lifestyles and too much screen time affect children's wellbeing. Available at: https://www.gov.uk/government/news/sedentary-lifestyles-and-too-much-screen-time-affect-childrens-wellbeing (Accessed: 6 January 2017).
- Reed (no date) Average salary UK. Available at: http://www.reed.co.uk/average-salary (Accessed: 6 January 2017).
- Reilly, T. and Collins, K. (2008) 'Science and the Gaelic sports: Gaelic football and hurling', European Journal of Sport Science, 8(5), pp. 231–240.
- Ridgers, N.D., Stratton, G. and Fairclough, S.J. (2006) 'Physical activity levels of children during school playtime', Sports Medicine, 36(4), pp. 359–371.
- Sukamolson, S. (2005) *Fundamentals of quantitative research*. Available at: http://www.culi.chula.ac.th/Research/e-Journal/bod/Suphat%20Sukamolson.pdf (Accessed: 12 January 2017).
- Statistics, O.F.N. (2016) Families and households in the UK: 2016. Available at: https://www.ons.gov.uk/peoplepopulationandcommunity/birthsdeathsandmarriages/families/bulletins/familiesandhouseholds/2016 (Accessed: 5 January 2017).
- Sport NI (2016) Available at: http://www.sportni.net/funding/our-funding-programmes/facility-fund/ (Accessed: 11 January 2017).
- Vallerand, R.J. Gauvin, L.I. and Halliwell, W.R. (1986). *Negative effects of competition on children's intrinsic motivation*. The Journal of Social Psychology, 126(5), pp.649-656.
- Vereecken, C. and Vandegehuchte, A. (2003). *Measurement of parental occupation: Agreement between parents and their children*. Arch Public Health, 61(3), pp.141-9.
- Warburton, D.E. Nicol, C.W. and Bredin, S.S. (2006). *Health benefits of physical activity: the evidence*. Canadian medical association journal, 174(6), pp.801-809.
- Woods, C.B., Moyna, N., Quinlan, A., Tannehill, D. and Walsh, J. (2010) *The Children's Sport Participation*. Available at: https://www.ucd.ie/t4cms/CCLSP_Study_Report1.pdf (Accessed: 9 January 2017).
- WHO (2016) *Childhood overweight and obesity*. Available at: http://www.who.int/dietphysicalactivity/childhood/en/ (Accessed: 6 January 2017).
- Wiersma, L. D. (2000). *Risks and benefits of youth sport specialization: Perspectives and recommendations.* Pediatric Exercise Science, 12, 13–22.
- Zollinger-Read, P. (2013) How technology and inactive lifestyles are changing our children how technology and inactive lifestyles are changing our children. Available at: https://www.theguardian.com/sustainable-business/technology-inactive-lifestyle-changingchildren (Accessed: 6 January 2017).

Appendix A – Breakdown of Social Classes

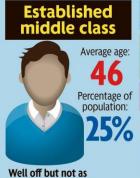


Average household £89.000 income after tax: Average house value (rented £325,000 counts as £0): Average house £142.000 hold savings:

Common occupations:

Chief executives, IT and telecoms directors, marketing and sales directors

Percentage of graduates: 56%



Average household £47.000 income after tax: Average house value (rented £176.000 counts as £0): Average house £26,000 hold savings:

Common occupations:

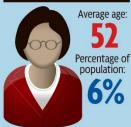
Electrical engineers, occupational therapists

Percentage of graduates: 43%

echnical middle class

wealth sets them apart from

everyone else.



New class with high earnings and savings. They are not keen on culture and have relatively few social contacts. Average household income after tax:

Average house value (rented counts as £0): Average house hold savings:

£163.000 £65,000

£37,000

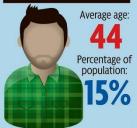
Common occupations:

Medical radiographers, aircraft pilots, pharmacists **Percentage of** graduates: 26%



privileged as the elite. They are sociable and

enjoy cultural hobbies.



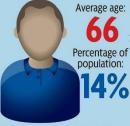
Medium levels of wealth and higher levels of cultural and social interaction. They are a young and active group.

Average household £29,000 income after tax: Average house value (rented £128.000 counts as £0): Average house £4,000 hold savings:

Common occupations: Electrical and electronic technicians

Percentage of graduates: 11%

Traditional working class



This class scores low in all areas except for house value. The average age of this class is older than the others. Average household income after tax:

Average house value (rented counts as £0):

Average household savings:

£21,000

£127.000

£9,000

4% Common occupations:

Mostly retired but also includes lorry drivers and electricians

Percentage of graduates: 11%

Emergent service workers Average age: Percentage of population:

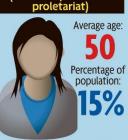
New class with low earnings and savings but very socially and culturally active. This group is the youngest.

Average household £13.000 income after tax: Average house value (rented £17,000 counts as £0): Average house-£1.000 hold savings:

Common occupations: Bar staff, chefs, nursing auxiliaries and assistants

Percentage of graduates: 19%

Precariat (short for precarious proletariat)



Most deprived class with low economic, cultural and social capital. The everyday lives of this class are precarious.

Average household £8,000 income after tax: Average house value (rented £26.000 counts as £0): Average house-£7.000 hold savings:

Common occupations:

Cleaners, van drivers, care workers

Percentage of graduates: 3%