Leadership in Multiple Perpetrator Stranger Rape

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Abstract

Sexual offences by multiple perpetrators are more violent and involve more severe forms of sexual violation than those perpetrated by a lone offender. Often a clear leader exists within these groups. Questions have been raised as to the relative risk of reoffending and the potentially differing criminogenic needs of leaders and followers. However, a recent study comparing leaders and followers in juvenile multiple perpetrator rapes (t’Hart-Kerkhoffs et al., in press) failed to find some of the expected differences. It was proposed that this might be due, in part, to the way leaders and followers were classified in their study. Before work can progress in this area, it is important to devise reliable and valid means of identifying leaders and followers in multiple perpetrator rape. This paper reports on a study which investigated the utility of two different methods of identifying leadership. The Scale of Influence (Porter & Alison, 2001) was applied to a sample of 256 offenders responsible for 95 multiple perpetrator rapes from the United Kingdom (UK). Following this, the relative number of directives uttered by offenders was used to designate leadership. In 66% of the offences sampled, a leader was designated using the number of directives uttered compared to 80% when using the Scale of Influence. When combining both measures to form a composite measure of leadership, this percentage increased to 89%. Classifications of offenders as leaders, followers and neither, according to the Scale of Influence, the count of directives and the composite measure, were compared to classifications made by a practitioner to assess their concordance. The composite measure showed the greatest agreement with practitioner opinion. These findings suggest that the Scale of Influence could be developed to take account of other ways that leadership is displayed during multiple perpetrator rapes.

Keywords: dominance, authority, influence, group rape, gang rape
Leadership in Multiple Perpetrator Stranger Rape

The literature on rapes by multiple perpetrators contains a variety of terms to describe such offences; gang rape and group rape being two of the most common. For example, group rape has been defined as “A rape in which one or more victims are subjected against their consent to sexual intercourse with two or more offenders” (Amir, 1971, p.182). However, as noted by Horvath and Kelly (2009), “group” and “gang” can have connotations beyond describing the number of people involved in an activity. For this reason, the current study employed the term “multiple perpetrator rape” to describe rapes involving one or more victims and two or more offenders, as recommended by Horvath and Kelly (2009).

Multiple perpetrator rapes occur across societies and in some countries they account for a substantial proportion of all rapes and sexual assaults. In the United Kingdom it is estimated that between 7-23% of sexual assaults are committed by multiple perpetrators. Their prevalence within the United States is reported to be 1 in 10 rapes, although figures vary widely from 2% in student samples to 26% in police samples (Horvath & Kelly, 2009). Similar figures are recorded in countries like South Africa where between 12-27% rapes are perpetrated by multiple individuals (Vetten & Haffejee, 2005). Higher figures are reported elsewhere, for example, in the Netherlands two-thirds of all sexual offences by juveniles are committed with one or more co-offenders (Boelrijk, 1997, as cited in Bijleveld & Hendriks, 2003).

As well as being relatively prevalent, sexual offences by multiple perpetrators more often involve penetration and physical violence against the victim than those committed by lone offenders (e.g. Gidycz & Koss, 1990; Hauffe & Porter, 2009; Ullman, 2007; Woodhams, 2004). Various theories from social psychology have been used to explain this (Harkins & Dixon, 2010; Woodhams et al., 2007), which include deindividuation, norm-enhancement, modelling and groupthink. With regards to the focus of the current paper, consideration has
also been given in the sexual offending literature to the effects of the leader’s influence over
the behaviour of other group members.

It is important to note at this point that some multiple perpetrator rapes and sexual
assaults occur without the discernable influence of a leader. Although some have argued that
it is unusual for groups to reach a mutual decision to rape (Groth & Birnbaum, 1990), with
their sample, Biljeveld, Weerman, Looije, and Hendriks (2007) identified a leader in one-
third of their 25 offences committed by juvenile offenders from the Netherlands. In the
remaining two-thirds of offences they noted that for some there was no leader, resulting in
more chaotic offences, or that leadership was shared between two offenders. In contrast, with
a mixed sample of juvenile and adult offenders, Porter and Alison (2001) identified a leader
in 37 of the 39 offences they examined, which were mainly from the United States of
America.

Where leaders have been identified in sexual offending groups, they appear to play a
pivotal role. Blanchard (1959) interviewed the members of two groups who had committed
group rape. The leaders in each group reportedly played a significant role in finalising and
mobilising the group’s intent. This led Blanchard (1959) to propose that without the presence
of the leaders neither rape would have happened. Similarly, Amir (1971) and Groth and
Birnbaum (1990) stressed the importance of the leader for creating and sharing the group’s
goals within a rape and initiating the offence. In a group situation, Blanchard remarks that
the sexual feeling in the leader seems to be stimulated by the presence of the followers with
the leader subsequently directing the group’s attention onto sexual matters. When discussing
the leaders in his sample of rapes from the United States, Amir (1967) explains that the leader
of the group will more often intimidate the victim into submission, will more often show
violence towards the victim, will initiate beatings of the victim, and will rape the victim first.
Similarly, in describing cases of multiple perpetrator rape from the United States, Franklin
Leadership in Multiple Perpetrator Rape (2004) noted that the leader plans the act and is more likely to be the first in the group to be sexually and physically violent towards the victim. It is suggested that instigating the rape serves the purpose of proving the leader’s masculinity (Franklin, 2004).

In terms of the mechanisms by which the leader exerts his influence, it has been suggested that the direction of the leader can result in diminished feelings of responsibility in the other group members (Groth & Birnbaum, 1990) and that the followers follow suit due to their emotional dependence on the leader and peer pressure (Franklin, 2004). The implications of not conforming include expulsion from the group, being labelled as non-masculine and being victimised themselves (Franklin, 2004).

Researchers and clinicians suggest that without the presence of the leader, some multiple perpetrator rapes would not have occurred (Blanchard, 1959), and that leaders initiate and mobilise the group to sexually offend (Biljeveld, et al., 2007), raise interesting questions regarding the relative risk of offending for different group members and levels of psychopathology. Thus far there has been little research examining the differences between leaders and followers in multiple perpetrator rapes. The research and professional opinion that does exist on leaders and followers is outlined below.

Leaders of multiple perpetrator rapes have been described as more delinquent (Franklin, 2004), which, if confirmed by a body of empirical research, would suggest leaders are at greater risk of re-offending and thus should be a priority for intervention and the targeting of police resources. Citing Hochstetler’s (2001) study of robbers and burglars, ‘t Hart-Kerikhoffs, Vermeiren, Jansen, and Doreleijers (in press) suggest that “leaders might exhibit more severe conduct problems” and “followers may be characterized by social impairment and subsequent lack of resistance to group pressure” (p. 3). Differences between leaders and followers in terms of psychopathology and criminogenic needs would indicate a need to tailor interventions depending on an offender’s role within the group.
't Hart-Kerkhoffs, et al. (in press) compared the characteristics and re-offending of leaders and followers with a sample of 109 adolescent male group sex offenders who had been referred to the Child Protection Agency in the Netherlands for assessment. The youths had sexually assaulted or raped a peer or an older adult. Each adolescent was categorised as a leader or follower or neither based on a question within the Global Assessment Instrument for Juvenile Sex Offenders (GAIJSO, van Wijk, ‘t Hart, Doreleijers & Bullens, 2005; ‘t Hart-Kerkhoffs, van Wijk, Bullens & Doreleijers, 2006) regarding his position within the group. Twenty of the males could not be categorised as a leader or a follower representing 18% of the sample. The remaining leaders and followers (representing 29 group sex offences) were compared on socio-demographic and crime characteristics, intelligence, mental health problems and daily functioning indicators, risk factors for sex offending, emotional problems as measured by the Strengths and Difficulties Questionnaire (Goodman, 2001), conduct problems, hyperactivity/inattention, peer relationship problems and prosocial behaviour, social relational aspects of autism spectrum disorder as measured by the Children’s Social Behaviour Questionnaire (Hartman, Luteijn, Serra & Minderaa, 2006), exposure to trauma, their criminal history and sexual recidivism rates.

The followers were found to use significantly more excessive force during the offence and score significantly lower on emotional problems, but significantly higher on scales indicating difficulties in the social relational domain (‘t Hart-Kerkhoffs, et al., in press). No significant differences were found on the remaining measures. ‘t Hart-Kerkhoffs, et al. (in press) propose that the failure to find expected differences between leaders and followers might, in part, be due to the method by which the offenders were categorised. As a result, they call for “special attention” to be given to the method of classification of leaders and followers. Before research can progress in this area, there is a need to identify a reliable
method of identifying leadership in multiple perpetrator rape which can be adopted by future studies.

The potential positive and negative effects of existing group dynamics on the therapeutic process is another reason why it is important to be able to reliably identify leaders and followers in multiple perpetrator rape. Some leaders will deny their status (Etgar & Pragar, 2009) therefore the clinician cannot always rely on self-report. Etgar and Pragar (2009) propose that, during therapy, it is important for the leader to be encouraged to recognise his status within the group. Having a leader and a follower in the same therapeutic group can be problematic as the leader may encourage denial or minimisation of the offence by other group members. The leader may “threaten, intimidate, or convince the second youth to stick to one version [of the offence] or another, or to say certain things and not others” (Etgar & Pragar, 2009, p. 307). However, it is also argued that the influence of the leader over the followers can facilitate behavioural change if the leader engages with the intervention (Etgar & Pragar, 2009; Porter, 2008). In terms of preventing future re-offending, Porter (2008) proposes that “removal of the leader from the group may remove the initiative for criminal behaviour” (p. 40), at least in terms of the followers’ behaviour.

In summary, although existing research suggests there will not always be a leader in multiple perpetrator rapes (Biljeveld, et al. 2007; Porter, et al., 2001), where such an individual does exist, there are a number of advantages associated with being able to reliably identify them. Such a measure would benefit the development of research on the characteristics and relative risk of leaders and followers and it would assist in the planning and delivery of interventions with apprehended offenders.

The Scale of Influence (Porter & Alison, 2001)

In 2001, Porter and Alison proposed that “different individuals [in a rape] may be considered as possessing degrees of influence over others rather than having either no ability
or absolute ability in influencing others” (p. 475), with the leader possessing the greatest influence. Following a theoretical review of the literature, they developed a Scale of Influence to assess influence and leadership. In their article they proposed that leaders can exert influence over other group members directly, through verbal means, and that their intentions will also be revealed to others implicitly through their actions. They argued that giving orders represents a more extreme form of control as it is a more explicit form of communication and because it “shows a more definite intention to produce the desired behaviour” (p. 476). Drawing on literature regarding sexual assault and non-sexual offending, Porter and Alison considered how influence might emerge at different stages of a sexual assault and developed their measure around the following decisions; formulating the initial idea, selecting the target, approaching the victim, forcing sexual behaviour, and disposing of the victim. A greater degree of influence at each stage was afforded a higher score.

Initially, Porter and Alison (2001) tested their measure on 39 cases of convicted multiple perpetrator rape, committed by 120 offenders, taken from a content analysis of archival data (magazine articles) and one police interview of a victim. A partially ordered scalogram analysis (POSA) was used to plot the individuals in geometric space whereby two individuals with similar scores on the measure would be located in close proximity. From this plot, a $J$-score could be allocated to each offender. This score is not equivalent to, but is associated with, the raw score on the Scale of Influence. The $J$-scores were used to allocate leader status to the offender who scored the highest within a group, with the remaining offenders labelled as followers. As noted above, this was possible in 37 of the 39 offences (95% of their sample). In addition, tests of difference revealed that those offenders designated as leaders scored significantly higher in terms of influence than the followers. In
Leadership in Multiple Perpetrator Rape

2006, Porter and Alison applied the scale successfully to a sample of convicted group robberies resulting in a leader being designated in 103 of the 105 groups.

Whilst these preliminary studies suggest that the Scale of Influence is an effective means of identifying leaders in criminal groups, these studies have a number of limitations. First, the samples all represent convicted cases of criminal behaviour. As Porter and Alison (2001, 2006) recognise, this makes them a select sample of offences, particularly the sample of rapes, due to the bias evident in the prosecution of rape cases (HMCPSI, 2002; Lievore, 2004) and the reporting of rape cases in the media (Franiuk, Seefelt, & Vandello, 2008). Second, the scale was developed on a sample of rapes, the majority of which resulted in the victim’s murder. Although Porter and Alison (2001) are clear to emphasise that disposal does not necessarily mean body disposal, but can mean returning the victim to the approach location, the stage “disposal of the victim” might be less applicable in some rapes. Third, the sample of rape cases is relatively small therefore it is desirable to test its performance with a larger sample of rape cases. Fourth, Porter and Alison (2001) themselves note that some stages covered by the Scale of Influence would only be discernable from certain sources of information. For example, the initial idea stage would not necessarily be recorded in a victim’s account of a multiple perpetrator rape, on which the start of a police investigation is often based, as this decision-making can occur prior to the victim’s involvement (Porter, 2008). The potential use of the Scale of Influence for police intelligence purposes and for prioritising individuals for police attention means that it would be desirable for the Scale of Influence to be shown to be as effective with unconvicted rape cases. Before the scale could be adopted for such purposes, its effective use with victim accounts would also need to be evidenced. Fifth, whether the Scale’s classification of individuals as leaders and followers corresponds with classifications using other methods (e.g., practitioner opinion) is also something that remains to be tested. Finally, it is the current authors’ experience that orders
Leadership in Multiple Perpetrator Rape

are given in the context of a sexual assault that go beyond those included in the Scale of Influence. This raises the question of whether there are additional ways in which influence could be measured during multiple perpetrator rape.

Capturing additional means of influence could be beneficial in whatever setting the scale was being used. However, it would be particularly helpful if the Scale were to be used for policing purposes, where information might be missing about earlier stages of decision-making (e.g., the initial idea) but where comprehensive information is available about the sexual offence itself. It might also prove valuable in therapeutic settings where such information is not forthcoming from the offenders. The field of linguistics presented one such possibility.

Using Directives to Identify Leadership

In linguistic research, the use of a type of speech act, called a directive, has been associated with leadership, power differential, and the communication of power (Bilbow, 1998; Morand, 2000; Vine, 2009). A directive is an utterance which aims to get the hearer to do or not do something (Leech, 1983; Takano, 2005). In analyses of workplace dialogue, a higher density of directives are seen in situations where tasks have to be assigned to an individual, during problem-solving exercises, and where there is a greater power differential between speaker and hearer, e.g., between managers and subordinates (Vine, 2009). If the individuals committing multiple perpetrator rapes occupy positions of different status within their group, as has been reported (Porter & Alison, 2001; Etgar & Prager, 2009), it is possible that the relative use of directives could also be used to identify who has the greatest power within the group and thus could be labelled the leader. Indeed, researchers of group sex offending have reported leaders to issue nearly all the orders (a type of directive) during an offence and that these orders are targeted at both co-offenders and the victim (Biljeveld, et
Leadership in Multiple Perpetrator Rape

Directives made to the victim in a multiple perpetrator rape could identify a leader who is leading by example rather than an autocratic leader (Porter, 2008).

To investigate this further would require us to be able to reliably code the speech of offenders uttered during a sexual offence. Woodhams and Grant (2006) investigated whether this was possible with a sample of 188 rapists’ utterances from 16 victim accounts of stranger rape. Coding for speech acts, such as directives, only requires the victim (or offender) to be able to recall the gist of what was said. This is advantageous because there are several reasons why a victim’s account might not reflect exactly what an offender said at the time (Woodhams & Grant, 2006) and offenders may be interviewed about their recollection of an offence some time after it occurred. Woodhams and Grant found that all utterances in their sample could be coded into speech act types (including directives) and that the inter-rater reliability was high.

In summary, there is literature dating from the 1950s to the present day which has highlighted the influence of leaders in multiple perpetrator rapes and which has raised questions as to the possible differing risk profiles and criminogenic needs of leaders and followers. However, it is not large in volume nor has a reliable means of identifying leadership been established. The need for such a measure was highlighted by ’t Hart-Kerkhoffs, et al. (in press). A measure of leadership for multiple perpetrator rapes has been developed, the Scale of Influence (Porter & Alison, 2001), however, it requires further testing and may need additional development to be utilised in all potential contexts. The discipline of linguistics provides an alternative way in which leadership could be measured; through a comparison of group members’ use of directives. This paper reports on a study which tested the utility of the Scale of Influence with a larger dataset of multiple perpetrator rapes, accessed from a different source than Porter and Alison (2001). This was compared to the use of directives for allocating leader status as an alternative to the Scale of Influence, or as a
potential means of extending the Scale of Influence. Both were also compared to practitioner ratings of leadership to determine their concordance.

The following research questions were investigated: 1) can the Scale of Influence (Porter & Alison, 2001) be applied to a larger, different, non-convicted sample of multiple perpetrator rapes with the same degree of reliability and success as has previously been reported; 2) can a leader be reliably designated in a sample of multiple perpetrator rapes based on the number of directives uttered by each offender in each offence; 3) by combining information regarding influence from the Scale of Influence and the count of directives, can the percentage of offenders classified as either leaders or followers be increased; and 4) do classifications of offenders as leaders, followers or neither using the Scale of Influence and the count of directives correspond with one another and do they correspond with practitioner ratings?

Method

Data

Data were collected on 95 allegations of multiple perpetrator rape committed by 256 male suspects against 95 victims. The data were obtained from the Serious Crime Analysis Section (SCAS) of the National Policing Improvement Agency. SCAS is a police analytical unit located in the United Kingdom with national responsibility to carry out analytical work on behalf of all police forces. SCAS collates and analyses information on serious crime that fulfils its criteria (predominately stranger murders and serious sexual assaults and/or rapes) and has the most comprehensive collection of data on stranger sexual assault in the UK.

Case files contained a variety of sources of information about the offence. For 50% of cases (n=48), the source of information was the victim statement (an account of the crime which is written by the interviewing officer and victim collaboratively), for 39% (n=37) it was a record of the victim’s interview by the police written by the interviewing officers.
Transcripts of the police’s interview of the victim were the source of information for 3% of cases \((n=3)\) and for 4% of cases \((n=4)\) the actual DVD recording of the victim’s interview was watched. In two cases (2%) both a DVD and the interview transcript were available and in one case (1%) both a case summary prepared for the Crown Prosecution Service and the record of the victim’s interview was read.

Most victims were female (94%, \(n=89\)) and for the majority of offences (93%, \(n=88\)) the suspects were all strangers to the victim. In the remaining cases, at least one suspect in the group was a stranger to the victim. The mean victim age was 25 years \((SD = 9.45, \text{Range} = 13-55)\). The suspects’ ages ranged from 16 to 40 years with a mean of 26 years \((SD = 6.01)\). Five per cent of the suspects were aged less than 18 years. Most groups consisted of two suspects (54%, \(n=51\), Range 2-7).

Procedure

The nature of the research study required a reliable but anonymised record of the victim’s account of the offence to be created for the purposes of analysis. Victims’ accounts of a sexual assault are not limited to a description of the offence but also contain information about the victim’s work/home/personal life, how the sexual assault has affected them, and what the victim was doing prior to encountering the offender. Such information was not required for the purposes of this research study, therefore the case file for each offence was read and a narrative of each offence was written from the victim’s account that focused solely on what occurred during the offence itself. This narrative preserved the order in which the behaviours of the victim, offender and witnesses were reported to occur, and how they were described by the victim. All identifying information, such as names, dates or places were not included in the narratives to protect the identity of all parties. The narratives were constructed by the first and second author in consultation with one another on the secure Police site.

Measures
Two different measures of leadership were applied to the narratives.

*Porter and Alison’s (2001) Scale of Influence*

As outlined above, the Scale of Influence measures influence through the decisions, actions and orders made/given by an offender during an offence. For example, an offender will score higher on the scale if he/she decided to commit the offence and if he/she selected the target. A higher score is also given where an offender instructs another member of the group to engage in an action rather than engage in the action him/herself. For example, a higher score is given if the offender orders another person to commit the first sexual assault on the victim compared to if the offender him/herself commits the first sexual assault on the victim. The various stages of a sexual offence are all represented in the scale (the approach, maintenance and closure stages), however more behavioural acts are associated with the approach stage. The scale has been applied to a sample of multiple perpetrator rapes (Porter & Alison, 2001) and a sample of group robberies (Porter & Alison, 2006) and on both occasions, adequate inter-rater reliability was reported (a kappa of 0.62 for rape [Porter & Alison, 2001] and 0.77 for robbery [Porter & Alison, 2006]). The scale requires the coder to consider the influence of each offender in each sexual offence according to six decisions at various stages of the offence as outlined earlier. Each offender can achieve a score of between 6 and 16, with a higher score denoting greater influence. An offender was designated the “leader” if he scored higher than the other members of the group (Porter & Alison, 2001). In such circumstances, all other members were labelled as followers. Where all members of a group scored the same on the scale, all were categorised as “neither” leader nor follower.

*Assessing leadership using directives uttered*

The verbal behaviour of each offender in each offence was scrutinised to determine if each speech act represented a directive or not. The definition of a directive that was used was
“An utterance has directive force if it indirectly or directly gets someone to do or stop doing something” (Woodhams & Grant, 2006, p.252). Examples of directives uttered during a rape by an offender would include demands to the victim to remove clothing or suggesting a change of location. On 46 occasions, representing 6% of the directives uttered by the perpetrators, it was not clear due to a lack of detail which offender had uttered a directive. On such occasions, all offenders were coded as having uttered it. Whilst this overestimates the number of directives used by offenders overall, it does not artificially increase any difference in the use of directives between co-offenders. The number of directives uttered by each offender in each offence overall was summed, as was the number aimed at the victim and the number aimed at co-offenders.

Assessing concordance of methods with practitioner opinion

The 95 accounts of multiple perpetrator rape were given to a practitioner with more than 12 years experience of working with sex offenders in therapeutic settings. The practitioner was asked to read each offence and determine, according to her professional opinion, 1) if there was a leader present, and 2) if so, to identify the leader and the followers. To avoid possibility that the practitioner’s rating may be biased by prior knowledge of the Scale of Influence, a practitioner was selected who had not been exposed to either the Scale of Influence or the literature on directives prior to conducting this task.

Reliability of Coding

The Scale of Influence required the coders to rate the offences on a numerical scale, therefore that and the number of directives uttered both represented continuous data. As such, inter-rater reliability was assessed using intra class correlations (ICC) (the absolute agreement method). Ten offences were randomly chosen for dual coding. Two raters coded these for directives uttered and three raters coded them using the Scale of Influence. An ICC of 0.66 was found for the number of directives directed at co-offenders, 0.97 for directives
made to the victims, and 0.97 for the total number of directives uttered. The former represents an adequate level of inter-rater agreement and the latter two values a substantial degree of inter-rater agreement (Dyrborg, et al., 2000). An ICC of 0.70 was found for the Scale of Influence indicating a moderate degree of inter-rater agreement (Dyrborg, et al., 2000).

Results

Scale of Influence

The scores of the offenders on the Scale of Influence ranged from the minimum possible score of 6, to a maximum score of 11 ($M = 7.80$, $Mdn = 8.00$, $SD = 1.31$). Even the highest scoring offenders in the sample therefore did not approach the maximum possible score (16).

Identifying Leadership Using the Scale of Influence

In 80% of the offences ($n=76$), one offender scored higher on the Scale of Influence than the other offenders in the group and was therefore designated the “leader”. This resulted in 122 “followers”. The distribution of leaders’ and followers’ scores can be seen in Figure 1.

**Insert Figure 1 approximately here**

A Mann Whitney U test was used to assess whether leaders’ scores ($Mdn = 9.00$, Range = 7.00-11.00) were significantly higher than followers’ scores ($Mdn = 7.00$, Range = 6.00-9.00), since the distributions of scores were significantly different to a normal distribution (as assessed by Kolmogorov-Smirnov tests). This difference was significant ($U=836.50$, $z=-9.93$, $p<.001$, $r=.71$) with a large effect size (Pallant, 2007).

Use of Directives

The number of directives recorded as being uttered by a given offender ranged from 0 to 28 ($M = 2.85$, $Mdn =1.00$, $SD = 4.17$). The majority of directives uttered by the offenders were directed towards the victim. The number of victim-oriented directives uttered by a
given offender ranged from 0 to 25 ($M = 2.33$, $Mdn = 1.00$, $SD = 3.78$) and the number of co-offender-oriented directives ranged from 0 to 7 ($M = 0.51$, $Mdn = 0.00$, $SD = 1.02$).

**Identifying Leadership Through Directive Use**

Leadership was allocated to the offender who had uttered the most directives in total in the offence. Offenders who had uttered fewer directives than the “leader” were allocated the label of “follower”. Where the number of directives uttered by the offenders was identical no offender was designated “leader” or “follower” and the offenders were classified as “neither”. Using the total number of directives uttered, for 59 offences (66%) a leader was identified and 108 offenders were designated followers. The distribution of directives uttered by leaders and followers can be seen in Figure 2.

**Insert Figure 2 approximately here**

To determine whether leaders, uttered significantly more directives than followers, tests of difference were computed for victim-oriented directives, co-offender oriented directives, and total directives. The distribution of each variable differed significantly from a normal distribution therefore Mann-Whitney U tests were conducted. The medians and ranges are reported in Table 1.

**Insert Table 1 approx here**

The leaders uttered significantly more directives of all types than followers; victim-oriented ($U=1330.50$, $z=-6.34$, $p<.001$, $r=.49$), co-offender-oriented ($U=2628.50$, $z=-2.20$, $p=.03$, $r=.17$), and total directives ($U=1237.50$, $z=-6.60$, $p<.001$, $r=.51$). A small effect was found for co-offender-oriented directives but a large effect for victim-oriented directives and total directives (Pallant, 2007).

**Concordance between the Methods**

Whether the two methods agreed on their classification of offenders was assessed through a contingency table. One offence was removed from this analysis, since it had
involved no reported speech on the part of the offenders and therefore had not formed part of
the analysis of directives uttered. Ninety four offences were thus subject to concordance
analysis. The agreement between the two measures can be seen in Table 2.

**Insert Table 2 approx here**

As shown by the figures in bold in Table 2, for 154 offenders (61% of the sample) the
two measures agreed in their classification, and for 126 offenders (50%) the two measures
agreed in the designation of a leader and followers. Thirty-three (35% of the cases) of the
multiple perpetrator rapes sampled were unclassifiable using one method but classifiable if
using the alternative method. However, for 28 offenders (11% of offenders) neither method
would classify them as either a leader or a follower.

A Combined Approach

Whilst both methods of classification were able to designate a leader in the majority
of the offences sampled, there was still at least one-fifth of the sample where this was not
possible. Since analysis of the measures’ concordance had revealed that for some cases,
where one measure was unable to classify an offender as the leader, the other had achieved
this, this raised the question of whether classification could be improved by taking a
combined approach. The utility of a composite measure of leadership was assessed by
summing the total score from the Scale of Influence with the total number of directives
uttered. Since a higher score on both measures indicates greater influence, indicative of
leadership, this was also the case with the composite measure. As conducted previously, the
label of “leader” was given where one offender scored higher than his co-offenders on the
composite measure. The label “follower” was given to the co-offenders in such cases.
Where no one offender scored higher than his co-offender, all were given the label “neither”.
Total scores ranged from 6 to 38 (M = 10.64, Mdn = 9.00, SD = 4.76). Two hundred and
twenty nine of the 254 offenders were classified as either a leader or a follower, thus for 89%
Leadership in Multiple Perpetrator Rape

of the cases sampled ($n = 84$) an offender was designated as the leader. There were therefore 84 leaders and 145 followers in the sample according to this composite measure. The classification rate of 89% is higher than that achieved with either method alone, which were 66% and 80% of cases. To determine whether those offenders designated as the leader scored significantly higher than those designated followers on the composite measure, a test of difference was computed. A Mann-Whitney U test was computed since the distribution of scores on the composite measure was significantly different to a normal distribution. The distribution for leaders’ and followers’ scores can be seen in Figure 3. This test revealed that “leaders” ($Mdn = 12.00$, Range = 8.00-36.00) scored significantly higher on the composite measure than “followers” ($Mdn = 8.00$, Range = 6.00-23.00) with a large effect size ($U=2167.00$, $z=-8.17$, $p<.001$, $r=.51$).

Concordance with Practitioner Ratings

As reported above, using each method each offender can be classified as a leader, a follower or neither. To determine whether the classifications made using the Scale of Influence, the number of directives uttered and the composite measure concord with classifications made by a practitioner, a further concordance analysis was conducted. A leader was identified by the practitioner in 68% of the offences ($n = 65$). Of the 254 offenders, the Scale of Influence and the practitioner agreed on their classification of offenders 64% of the time (see Table 3). A similar overall figure (65%) was obtained when comparing the practitioner ratings to the ratings based on the number of directives uttered (see Table 4). The level of concordance increased to 70% when comparing classifications made using the composite measure and the practitioner ratings (see Table 5).

Discussion
This study applied a previously devised measure of influence and leadership, The Scale of Influence (Porter & Alison, 2001), to a new and different data source of sexual assaults. In addition, an alternative way of identifying leadership, which draws on the field of linguistics, was assessed for its utility. The identification of leaders using these two methods was compared to practitioner ratings of leadership.

The Scale of Influence was initially devised using a dataset of convicted multiple perpetrator rapes, the majority of which resulted in the victim’s murder. It was able to classify offenders as leaders and followers in 95% of the offences in the development sample (Porter & Alison, 2001). The current study applied the same measure to a different and larger sample of multiple perpetrator rapes; a sample of 95 allegations of multiple perpetrator rape committed by 256 offenders who were strangers to the victim. The data for the study were taken from victims’ accounts of the offence, in contrast to the original study by Porter and Alison (2001) which largely used investigative journalism articles as the data source.

Reliability analysis indicated that the Scale of Influence could be applied to a new dataset with a moderate degree of inter-rater agreement. With the new sample, the Scale of Influence was unable to classify quite as many offenders as in the original study (80% versus 95%), however, this still represents a considerable number. That all offenders could not be classified should not be surprising since clinical observations of multiple perpetrator rapists have noted that a leader is not discernable in all cases and that some groups reach a mutual decision to rape (Biljeveld et al., 2007; t’Hart-Kerkoffs et al., in press). Indeed, in this study, the experienced practitioner identified a leader in only 68% of the cases. An assessment of concordance between ratings using the Scale of Influence and those made by an experienced practitioner revealed agreement 64% of the time.

In applying the Scale of Influence to victim accounts of rape, it became apparent that the answers to the initial questions on the measure, regarding whether a given offender put
forward the initial idea to rape or selected the victim, were often unknown since such decisions were likely made prior to contact with the victim. For this reason, the highest score obtained on the Scale of Influence with the current sample was much lower than the maximum possible score. A similar scenario could arise if using the Scale of Influence in a therapeutic setting with uncooperative offenders who refuse to disclose information about these initial stages.

In using the Scale of Influence, the three coders noted some difficulties when applying it to the current dataset beyond missing information about the initial stages of decision-making in multiple perpetrator rapes. Within our dataset, there was quite a range of possible scenarios for the closure stage of the rape. In some cases the victim was disposed of as described by Porter and Alison (2001), for example, the offenders might walk the victim back to where they had abducted her/him. However, in other offences, the victim broke free and departed the scene of his/her own accord. Such interrupted offences do not therefore have a disposal stage as such because the victim’s behaviour has interfered with any plans the offenders might have made for his/her disposal. A further scenario that was observed was the offenders ceasing their assault on the victim and immediately running off in different directions. It is quite possible that decisions were made regarding such a disposal prior to the victim’s involvement but when using the victim’s account of what occurred such decision-making is not always recorded. In addition, we observed orders being given during the offence which were not captured by the items on the measure. For example, orders were given by an offender to co-offenders regarding moving the victim to a location. In addition, co-offenders were ordered to engage in sexual acts with the victim other than the first sexual act. The Scale of Influence in its current form gives higher scores for influence where an offender directs others to engage in the first sexual act with the victim, however, what we observed in the dataset was an offender raping the victim and, following this, ordering a co-
offender(s) to engage in sexual acts. This seemed to be related to turn-taking and hierarchy within the group and thus would presumably be very relevant to power, status and leadership. It is therefore likely that the Scale of Influence could be extended to capture such examples of influence being exercised.

Related to this point was an additional aim of the current study; to investigate the utility of employing the relative use of directives in assessing influence and leadership. Directives are a speech act where one is trying to exert influence over another party and in multiple perpetrator rapes this could include exerting influence over the victim or over co-offenders, as alluded to above. In terms of the number of directives uttered, most were directed towards the victim. Few directives were given to co-offenders during the course of the rapes (seven being the largest number). Porter (2008), in summarising the research on the Scale of Influence, notes that order-giving to co-offenders was infrequent in her samples of group rapes and robberies and put this down, in part, to the young age of her samples and the more informal hierarchies in existence in groups of young offenders. Orders are a type of directive and thus the finding reported here is similar, however the sample in the current study contained more offenders aged over 25 years.

Reliability analysis indicated that this new method could be applied to the dataset with a moderate to substantial degree of inter-rater agreement. Leader status was allocated where an offender used more directives than the rest of the group. It was possible to designate leadership in 66% of the cases. This percentage is lower than that obtained with the Scale of Influence, however, the level of concordance with practitioner ratings was marginally higher at 65%. In one case, no speech by offenders was recorded in the victim’s account meaning that using directives to designate leadership would be unsuccessful with such cases. In addition, on 46 occasions (representing 6% of all directives uttered by
Leadership in Multiple Perpetrator Rape

In summary, when using either method the majority of offenders in the sample could be classified as a leader or follower. Assessment of the concordance of the measures, in terms of designating leadership, found that for the majority of offences there was agreement as to the classification of offenders. However, it was also apparent that where one measure failed to categorise offenders as either leaders or followers there were occasions where the other measure did. The scores from both measures were therefore combined which resulted in an increase in the number of cases in which leadership could be designated. Using a combined approach, 89% of the cases in the sample could be classified. The classifications made using the composite measure also resulted in greater concordance with the practitioner ratings. Cumulatively, these findings suggest there is utility in developing the Scale of Influence to take account of additional ways in which influence can be exerted by leaders in multiple perpetrator rapes. Incorporating a wider range of directives is one option to explore in future research. However, the level of concordance between the composite measure and the practitioner ratings suggests there might be other aspects of the group members’ behaviour that need consideration. For example, the practitioner indicated that she considered the relative use of violence by offenders and other forms of speech between co-offenders when designating leadership. In terms of the speech, this related to utterances which could suggest one offender was imparting knowledge of and experience regarding rape to his co-offenders.

To determine what other behaviours might be associated with leadership, it is recommended that research into this area is needed. For instance, a study would be extremely valuable whereby practitioners and offenders are systematically interviewed regarding the
behaviour exhibited by leaders and followers during multiple perpetrator rapes with a view to better understanding what behaviour characterises a leader compared to a follower.

Whilst the current study reports initial positive findings in terms of our ability to designate leadership in multiple perpetrator rapes, it has its limitations. From reading the victims’ accounts in the current study it was apparent that followers are not a uniform group and there is variation in terms of their degree of involvement in the offence. This was also noted by Porter and Alison (2001) in the development of their Scale of Influence. Porter (2008, p. 37) describes observing group structures with “leaders and lieutenants, and also linear structures, where every group member had a different influence input”. The different roles that individuals take within a multiple perpetrator rape and the structures that result is something that warrants further investigation.

In conclusion, it was found that the utility of the Scale of Influence generalised to a new and different sample of multiple perpetrator rapes. However, the results of our analyses, and the experience of the raters in using the measure, suggest it could be developed so that it captures other examples of offenders exerting their influence over one another, including incorporation of a greater variety of directives. If such developments are made and the amended measure is validated, it has the potential to contribute to the assessment and treatment of multiple perpetrator rapists and in assisting with the prioritisation of offenders for police attention.
References


Table 1: The number of directives uttered by offenders designated “leaders” and “followers” 
\( (N=167) \).

<table>
<thead>
<tr>
<th>Status</th>
<th>Victim-Oriented Directives</th>
<th>Co-Offender Oriented Directives</th>
<th>Total Directives</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Median</td>
<td>Range</td>
<td>Median</td>
</tr>
<tr>
<td>Leader</td>
<td>0.00</td>
<td>0-25.00</td>
<td>5.00</td>
</tr>
<tr>
<td>Follower</td>
<td>1.00</td>
<td>0-14.00</td>
<td>0.00</td>
</tr>
</tbody>
</table>

Table 2: A contingency table displaying concordance (in bold) in labelling offenders as “leader”, “follower” and “neither” for the Scale of Influence and the Total Number of Directives \( (N = 254) \).

<table>
<thead>
<tr>
<th>Scale of Influence</th>
<th>Total Number of Directives Uttered</th>
</tr>
</thead>
<tbody>
<tr>
<td>Leader</td>
<td>Leader</td>
</tr>
<tr>
<td>Leader</td>
<td>45</td>
</tr>
<tr>
<td>Follower</td>
<td>5</td>
</tr>
<tr>
<td>Neither</td>
<td>9</td>
</tr>
</tbody>
</table>
Table 3: A contingency table displaying concordance (in bold) in labelling offenders as “leader”, “follower” and “neither” for the Scale of Influence and the practitioner’s ratings (N = 254).

<table>
<thead>
<tr>
<th>Scale of Influence</th>
<th>Practitioner Ratings</th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Leader</td>
<td>51</td>
<td>3</td>
<td>21</td>
</tr>
<tr>
<td></td>
<td>Follower</td>
<td>4</td>
<td>85</td>
<td>32</td>
</tr>
<tr>
<td></td>
<td>Neither</td>
<td>9</td>
<td>22</td>
<td>27</td>
</tr>
</tbody>
</table>

Table 4: A contingency table displaying concordance (in bold) in labelling offenders as “leader”, “follower” and “neither” for the count of directives and the practitioner’s ratings (N = 254).

<table>
<thead>
<tr>
<th>Count of Directives</th>
<th>Practitioner Ratings</th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Leader</td>
<td>42</td>
<td>2</td>
<td>15</td>
</tr>
<tr>
<td></td>
<td>Follower</td>
<td>3</td>
<td>81</td>
<td>24</td>
</tr>
<tr>
<td></td>
<td>Neither</td>
<td>19</td>
<td>27</td>
<td>41</td>
</tr>
</tbody>
</table>
Table 5: A contingency table displaying concordance (in bold) in labelling offenders as “leader”, “follower” and “neither” for the composite measure and the practitioner’s ratings ($N = 254$).

<table>
<thead>
<tr>
<th>Composite Measure</th>
<th>Practitioner Ratings</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Leader</td>
</tr>
<tr>
<td>Leader</td>
<td>58</td>
</tr>
<tr>
<td>Follower</td>
<td>2</td>
</tr>
<tr>
<td>Neither</td>
<td>4</td>
</tr>
</tbody>
</table>
Figure 1: A histogram of the leaders’ and followers’ scores on the Scale of Influence.
Figure 2: A histogram of the number of directives uttered by leaders and followers.
Figure 3: A histogram of the leaders’ and followers’ scores on the composite measure.

\[\text{Where two or more offenders were responsible for an offence, their mean age was calculated.}\]