Mentoring

Toolkit technical report

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Abstract/Plain Language summary

The objective of this technical report is to review the evidence on the effectiveness of mentoring programmes as a strategy for preventing children and young people becoming involved in crime and violence. This technical report is mainly based on three systematic reviews: Burton (2020); Raposa et al. (2019); and Tolan et al. (2013).

The sole component of mentoring programmes is the act of creating mentor-mentee pairs or matches (Tolan et al., 2013). This can involve assigning a peer, an older youth, or a non-parental adult as a mentor for a suitable mentee. Components of mentoring programmes focus on topics such as: prosocial relationships, life skills/management, employability, self-esteem, problem-solving, communication skills, and tutoring or academic support (Raposa et al., 2019).

Mentoring programmes are implemented as prevention approaches and focus on supporting positive development (Tolan et al., 2013). Therefore, mentoring programmes are described as 'targeted' interventions (Raposa et al., 2019).

Adult-youth mentoring programmes are most common and involve a young person under the age of 18 being matched with an appropriate adult mentor (Raposa et al., 2019). However, mentoring programmes can involve participants of similar ages, and these are called cross-age mentoring (Burton, 2020).

Mentoring programmes aim to support positive development and prevent involvement in crime and violence through a developmental framework (Raposa et al., 2019). The theory of change is that mentees can develop social-emotional and cognitive skills through their relationships with mentors. Good mentor-mentee relationships can help youth develop other prosocial relationships and help them to improve self-regulation and information processing.

Tolan et al. (2013) report a 26% reduction in juvenile delinquency based on 25 evaluations of mentoring programmes, with an evidence rating of 4 (on a scale of 1 – 5). This is our preferred estimate to inform the headline metric in the Toolkit. Raposa et al. (2019) report a 19% reduction in externalising behaviours based on 38 evaluations of mentoring programmes, with an evidence rating of 2.

Both reviews reported mean effect sizes for additional outcomes and the results suggest that mentoring programmes have the potential to impact a wide range of risk and protective factors for youth offending and violence. For example, Tolan et al. (2013) found that mentoring programmes had a desirable effect on academic achievement, drug use, and aggression. Raposa et al. (2019) found that mentoring programmes have desirable effects on outcomes across several domains, including school, psychological, social, cognitive and health outcomes.

Moderator analyses suggest that, based on current evidence, mentoring programmes are more effective with male mentees and when mentors are male. Shorter meetings between mentors and mentees are also associated with greater effectiveness. Problem-specific mentoring programmes that appropriately address the needs of mentees are also more effective. Programmes with mentors who are considered professionals in 'helping professions' (e.g., counsellors, social workers, therapists), or who were involved in the programme for professional development/training, were also more effective. This is important for future programmes, as careful selection of mentors is required to ensure maximum effectiveness of programmes.

Cost-benefit analyses suggests that mentoring programmes may not be as low cost as was thought when they were first implemented in England and Wales. Higher costs are thought to be related to high attrition rates.

It is recommended to update the Campbell review (Tolan et al., 2013) which reports delinquency outcomes separately, unlike Raposa et al. (2019). In addition, an update should: (1) assess how high attrition in mentoring programmes has been handled in the primary studies, and the implications for estimates of effectiveness, and (2) examine the discrepant findings with respect to structured programmes.

Objective and approach of this technical report

The objective of this technical report is to review the evidence on the effectiveness of mentoring programmes as a strategy for protecting children and young people against involvement in crime and violence.

Mentoring programmes aim to improve youth outcomes for 'at-risk' populations through modelling and support from appropriate mentors. The behavioural impact of mentoring programmes on outcomes such as antisocial behaviour, aggression, violence, and delinquency is evaluated in this report.

This technical report is mainly based on three systematic reviews: Burton (2020); Raposa et al. (2019); and Tolan et al. (2013). Burton (2020) reviewed cross-age peer mentoring programmes, of which there is limited evaluation research. Only six studies are included in that review and only two of those evaluated effectiveness on relevant outcomes. Therefore, it is not taken into account in our analyses of effectiveness, but is used to inform the descriptive overview of mentoring programmes. A follow-up meta-analysis that compared specific approaches in adult-youth mentoring programmes also informs the current report (i.e., Christensen et al., 2020).

The following inclusion and exclusion criteria were used to inform the selection of systematic reviews.

Inclusion criteria

To be included in this report a systematic review must:
- Review the impact of mentoring programmes on crime, antisocial behaviour, aggression, violence or related outcomes.
- Review evaluations of programmes using experimental or quasi-experimental methods with before and after outcome measures. Both randomised and non-randomised designs were eligible for inclusion.
- Review either adult-youth mentoring programmes or peer-mentoring programmes.
- Report findings in the English language and published in peer-reviewed journals or by other reputable sources (e.g., Campbell systematic reviews, Cochrane systematic reviews) within the past 10 years (i.e., since 2010). Reviews that were not published in peer-reviewed journals, such as doctoral dissertations on ProQuest dissertation publishing, were also considered for inclusion if they met other criteria satisfactorily.

Exclusion criteria

Reviews were excluded for the following reasons:
- The review was outdated or has been updated recently (e.g., Tolan et al., 2008).

- The review did not include outcomes related to antisocial behaviour, crime, aggression, offending or violence (e.g., Wheeler et al., 2010).

There is one notable review of mentoring programmes that is excluded from the current technical report (DuBois et al., 2011). This review is excluded because it does not provide a direct estimate of effects on crime (the most relevant effect is on "conduct problems") and there was a much more recent review available that reported effects on a wider range of outcomes including the more relevant indirect measure of "externalising behaviour" (Raposa et al., 2019).

Outcomes

The impact of mentoring programmes can be assessed on a variety of outcomes, for example substance abuse or internalising problems such as depression. The current technical report is concerned with outcomes of antisocial behaviour, aggression, crime, and/or violence.

Raposa et al. (2019) reported the effectiveness of mentoring programmes on five outcome domains: school, psychological, health, cognitive, and social. These domains included several factors known to be associated with our outcomes of interest, such as externalising behaviours, substance use, social skills, social support, and self-regulation. The impact of mentoring programmes is reported separately for these outcomes.

Tolan et al. (2013) included evaluations of mentoring programmes that reported effects on at least one of four possible outcomes: delinquency, aggression, academic achievement and substance use. The overall effectiveness of mentoring programmes is reported alongside the specific effects on these outcomes.

Description of interventions

The sole component of mentoring programmes is the act of creating mentor-mentee pairs or matches (Tolan et al., 2013). This can involve assigning a peer, an older youth, or a non-parental adult as a mentor for a suitable mentee. Mentoring programmes tend to specialise in the intergenerational dynamic of the intervention, i.e., the programme involves adult-youth mentoring or cross-age peer mentoring. In relation to adult-youth mentoring, the

mentee is typically under the age of 18 and the mentor is an appropriate adult or an older youth.

The small effect sizes which have been found in evaluations of mentoring programmes has resulted in calls for them to be a vehicle for targeted skills development, which may be either life skills or academic training (Christensen et al., 2019).

An example of adult-youth mentoring programmes is the Big Brothers/Big Sisters of America initiative. Tolan et al. (2013) specify that the four fundamental components of mentoring programmes are: modelling/identification formation, emotional support, teaching and advocacy.

Examples of cross-age peer mentoring include 'Cross-Age Mentoring Program (CAMP) Cross-Campus Model' or 'Children Teaching Children'. Burton (2020) describes 'cross-age' peer mentoring as a "form of formal peer mentoring that matches an older youth mentor with a younger youth mentee to promote positive youth outcomes". This type of peer mentoring recognises that, beyond siblings and extracurricular activities (e.g., sports teams, youth clubs), there is little opportunity for natural relationships to form between youth of different ages, primarily as a result of grade-systems in education. Similar to adult-youth mentoring, pairing a younger youth mentee with an older youth mentor is said to provide support, guidance and an appropriate role model. In this way, the term 'peer' is used to indicate that both mentor and mentee are "of the same generation" (Burton, 2020, p. 5).

Tolan et al. (2013) describe mentoring programmes as either prevention or treatment approaches in relation to youth delinquency. In other words, mentoring programmes may include selective and indicated interventions with either young people already involved in crime or are not but need additional support to stay safe.

Raposa et al. (2019) report that the majority of adult-youth mentoring programmes were school-based (63%) and did not include a specific curriculum (82%). Moreover, most programmes were labelled 'unstructured' (62%) or 'semi-structured' (21%). Components of mentoring programmes focus on topics such as: prosocial relationships, life skills/management, employability, self-esteem, problem-solving, communication skills, and tutoring or academic support.

Mentoring may also be incorporated as a major, or minor, component of existing structured intervention programmes (Tolan et al., 2013). For example, mentees may also be engaged in family/individual/group counselling, community service, or social skills training.

Targeted or Universal

Adult-youth mentoring programmes are typically 'targeted' intervention (Raposa et al., 2019). Generally, youth who need additional support are enrolled in a mentoring programme and matched with a suitable mentor. Tolan et al. (2013) highlight that programmes have often used individual risk factors or environmental risk factors to decide which children and young people to work with.

Implementing personnel

Mentors are often, but not always, trained by organisations (e.g., Big Brothers Big Sisters of America) but reviews did not provide information on the implementing personnel for these training sessions (Raposa et al., 2019).

In relation to the actual mentoring intervention, the most important implementing personnel are the mentors enrolled in the programme. Raposa et al. (2019) reviewed evaluations of 'intergenerational' mentoring programmes where mentors were non-parental adults or older youths who were providing mentoring in a non-professional capacity. Across 70 evaluations, mentors were on average more likely to be female (58%) and identify as White (62%). The mean percentage of Black mentors in studies was 31%, and the mean percentages of Hispanic (9%), Asian (6%), Other (11%) and Multi-ethnicity (1%) were relatively lower. Raposa et al. (2019) reported that on average, 79% of mentors were helping professionals, for example counsellors or social workers. Across studies, the mean percentage of student mentors was 48%.

Tolan et al. (2013) reported minimal information about mentors but do report that mentors were often enrolled in the intervention for various motivations. Specifically, the authors refer to mentors who participated in the mentoring programme either for professional development, for the experience or for a 'civic duty'.

In cross-age peer mentoring programmes, the intervention typically involves a combination of one-to-one and group mentoring (67%, Burton, 2020). These programmes are also mostly implemented in schools (67%) and are not curriculum-based (83%). Cross-age peer mentoring does also involve adults, primarily in a supervisory context, and most programmes include a high level of adult supervision/oversight (60%; Burton, 2020). The focus of cross-age peer mentoring programmes can be described as academic, health, general or concerned with problem behaviours.

Duration and Scale

Raposa et al. (2019) reported on several elements of the duration and scale of mentoring programmes across the included 70 evaluation studies. On average, mentoring programmes lasted 11 months but ranged from 2 months to 5 years in length. The average length of meetings between mentors and mentees across all studies was 1 hour 42 minutes, but these meetings ranged from a minimum of 30 minutes to a maximum of 4 hours. The mean number of training hours that mentors received prior to participation was 4 hours (range = 1 to 16 hours). Raposa et al. (2019, p. 431) also reported that the average meeting frequency was '4' but do not provide a relevant unit or metric to explain the meaning of this value.

Burton (2020) included evaluations of cross-age peer mentoring programmes and found that the interventions were between 2 and 18 months long. The mean length was 8 months. The pre-training for mentors ranged from 2 to 8 hours, with a mean duration of 5 hours.

Theory of change/presumed causal mechanisms

The presumed causal mechanism in mentoring programmes can be explained through a developmental framework. Raposa et al. (2019) proposed that adult-youth mentoring programmes encompass three important and interconnected processes that enable behavioural change.

First, the social-emotional process aspect of development refers mostly to relationships with others. Rooted in attachment theory, social-emotional development highlights how positive mentoring relationships between adults and youth can change the youths' perceptions of other relationships, thereby encouraging the development of prosocial bonds and behaviours.

Second, the cognitive aspect of adult-youth mentoring suggests that, by engaging in discussion with adults, young peoples' cognitive skills such as information processing and self-regulation may be enhanced. Finally, Raposa et al. (2019) describe the process of identity formation, whereby adult mentors act as role models who can provide youth with aspirational qualities and goals.

Cross-age peer mentoring is similarly rooted in a developmental framework (Burton, 2020). The presumed causal mechanism is that "youth can reach a higher level of skills development and perform more complex cognitive, behavioural, and emotional tasks when working with or under guidance from those older than themselves". Cross-age peer mentoring also involves elements of group socialisation, specifically that youth will adapt or modify behaviours to be cohesive with the norms established by their peer group.

Evidence base

Descriptive overview

Evaluations of mentoring programmes are primarily conducted in the USA. As not one of the reviews used to inform the current report seem to specify the location of evaluations, this statement is not necessarily completely accurate, but it is a fair assumption based on the language and terminology used (Burton, 2020; Raposa et al., 2019; Tolan et al., 2013). Tolan et al. (2013) included evaluations of mentoring programmes published between 1971 and 2010, and the majority were conducted using randomised controlled designs (*n* = 27). Burton (2020) included evaluations of cross-age peer mentoring programmes published between 1994 and 2011 and the majority were evaluated using an RCT design (67%).

Raposa et al. (2019) reviewed 70 evaluations of mentoring programmes, including data from 25,286 mentees. The mean age of mentees across all evaluations was 12 years old, and 55% of all participants were male. Raposa et al. (2019) also report the ethnicity of mentees involved in included evaluations, as follows: Asian (5%), Black (43%), Hispanic (26%), White (32%). Additionally, 15% of all participants identified as 'other' ethnicity and 4% identified as 'multi-ethnicity' (Raposa et al., 2019). The majority of participants across all evaluations of mentoring programmes lived in a single parent household (63%) and were eligible for free

school meals (72%). Raposa et al. (2019) note that 82% of mentees were 'below grade academic functioning' and 83% reported problem behaviours.

Burton (2020) also included information about the demographics of mentees and mentors. The mean percentage for male mentees was 55% and the mean percentage for male mentors was 61%. Mentees were predominantly Black (50%), followed by White (35%) and Hispanic (15%). Comparatively, similar percentages of Black (43%) and White (48%) mentors were observed across evaluation studies. The mean age of mentees was 11 years old.

Assessment of the strength of evidence

The AMSTAR critical appraisal tool was used to evaluate the quality of the reviews used to inform the current report. The reviews by Burton (2020), Raposa et al. (2019), and Tolan et al. (2013) were deemed to be of high quality as assessed by the AMSTAR critical appraisal tool and two independent reviewers. Raposa et al. (2019) published their report in a peer-reviewed journal and Tolan et al. (2013) conducted a Campbell systematic review, with very high methodological standards. Burton (2020) is a doctoral dissertation. The results are summarised in Annex 3.

All three of the reviews adequately specified the research questions and the inclusion/exclusion criteria. The inclusion criteria included components relating to the population, intervention, comparison group and outcome of interest. Specifically, inclusion criteria referred to evaluations of mentoring programmes for at-risk youth. Tolan et al. (2013) specify that evaluations must have included *at least one* outcome relating to delinquency, aggression or a related factor (substance use and academic achievement). Raposa et al. (2019) specify that evaluations had to be of adult-youth mentoring programmes that reported effectiveness on at least one psychological, social, school, health or cognitive outcome. Burton (2020) included only evaluations of cross-age peer mentoring that reported on outcomes similar to Raposa et al. (2019).

Neither Raposa et al. (2019) nor Burton (2020) registered a protocol prior to publication of the findings. Tolan et al. (2013) reported that a written protocol was in place to guide the coding of eligible studies but did not indicate that this was published or accessible before the publication of their Campbell systematic review.

Tolan et al. (2013) included both experimental and quasi-experimental evaluations of mentoring programmes with or without random allocation to an intervention or a control condition. Evaluations must have met at least one of the following methodological criteria: (1) random assignment; (2) participants were matched on relevant variables at baseline; or (3) a comparison group was used and there was 'retrospective equivalence' on outcome variables and demographic variables at baseline. Burton (2020) and Raposa et al. (2019) also included randomised controlled trials and quasi-experimental evaluations. Therefore, the design of included studies was relatively high quality.

Each review reported a comprehensive literature search strategy including a number of different databases, designated keywords and search strategies. None of the reviews restricted inclusion criteria to only peer-reviewed publications. All three reviews only included evaluations published in English and Tolan et al. (2013) restricted searches to evaluations conducted in the USA or similar predominantly English speaking countries.

Tolan et al. (2013) reported that 20% of eligible studies were double-coded and the inter-rater reliability coefficients were satisfactory across a number of indicators. Burton (2020) stated that all studies (n = 6) were double-coded according to a pre-determined coding manual. Similarly, Raposa et al. (2019) reported that five raters coded eligible evaluations and followed a coding manual.

None of the reviews included a measure of risk of bias, beyond conducting some analyses for publication bias.

Both Tolan et al. (2013) and Raposa et al. (2019) provided information about funding received for their respective projects and declared no known conflict of interest.

Each of the reviews conducted a meta-analysis and reported detailed information on the synthesis and estimation of weighted effect sizes and adequately reported the heterogeneity between primary effects. Each of the meta-analyses reported separate weighted effect sizes for independent outcomes and assessed multiple moderators as possible explanations for heterogeneity between primary effect sizes.

Raposa et al., (2019) report a direct estimate of the effect of mentoring programmes on externalising behaviour based on 38 studies. The review does report an estimate of heterogeneity between-study effect sizes in their three-level meta-analysis ($\sigma^2_{level\ 3}$ = .07, *p* < .001), and so the evidence rating is 4 for the externalising behaviour outcome. This review provides only an indirect estimate for crime and violence outcomes and so the evidence rating for these outcomes is 2.

Tolan et al. (2013) report a direct estimate of the effectiveness of mentoring programmes on juvenile delinquency based on 25 studies. There was high heterogeneity between evaluations (I^2 = 99.3%) and so the evidence rating is 4. This is our preferred estimate to inform the headline metric.

Impact

Summary impact measure

Overall, mentoring programmes were effective across both outcome domains, i.e., juvenile delinquency and externalising behaviour. The weighted mean effect sizes for reviews of adult-youth mentoring are reported in Table 1. As mentioned, Burton (2020) is not considered here because that report included only two relevant evaluations.

Table 1

Mean effect sizes for externalising behaviours and delinquency

Review	ES (*d* and OR)	CI (ES)	*p*	% reduction	Evidence rating on crime and violence outcomes
Raposa et al. (2019); externalising behaviours	*g* = 0.15 OR = 1.31	*t* = 3.72	< .001	19%	2
Tolan et al. (2013); delinquency	SMD = 0.21 OR = 1.46	0.17, 0.25	< .001	26%	4

Note: ES = the weighted mean effect size; CI = 95% confidence intervals for the mean ES; *p* = the statistical significance of the mean ES; OR = odds ratio; *g* = Hedges' g reported under the random effects model of meta-analysis; SMD = standardised mean difference; *t* = t-test comparing *g* value with zero.

We transformed SMD and g to the OR using the equation Ln(OR) = SMD/.5513 (Lipsey & Wilson, 2001, p. 202). If we assume equal numbers in the experimental and control conditions (e.g., N = 100 in each condition) and that the prevalence of delinquency in the control condition is 25% (i.e., 25 delinquents out of 100), the odds ratio for Tolan et al. (2013) of 1.46 corresponds to 18.6% delinquents in the experimental condition, a relative decrease of approximately 26%. This estimate is not greatly affected by different assumptions. Further explanation of this transformation and how the relative reduction changes depending on the assumed prevalence is provided in Annex 1.

Our assumptions about the prevalence of offending are not unreasonable in light of UK criminological research. For example, in the Cambridge Study in Delinquent Development, which is a prospective longitudinal study of London males, 34% were convicted of criminal offences up to age 21, as were 20% of their sons (Farrington et al., 2015).

Raposa et al. (2019) reported that the weighted mean effect size for 70 evaluations of adult-youth mentoring programmes across all outcome domains was $g = 0.21$, $p < .001$. Similarly, Tolan et al. (2013) reported that the overall standardised mean difference across 46 evaluations of mentoring programmes was d = 0.18 (95% CI 0.15, 0.21). Both reviews report weighted mean effect sizes for multiple outcomes.

When the mean effect sizes were classified into broad outcome domains, Raposa et al. (2019) found that adult-youth mentoring similarly significantly improved:

(1) school outcomes ($g = 0.20$, $p < .001$);

(2) psychological outcomes ($g = 0.17$, $p < .001$);

(3) health outcomes ($g = 0.23$, $p < .001$);

(4) cognitive functioning ($g = 0.19$, $p < .001$); and

(5) social outcomes ($g = 0.19$, $p < .001$).

Of most relevance to this report, Raposa et al. (2019) found that adult-youth mentoring programmes significantly improved mentees' self-regulation ($g = 0.22$, $p < .01$), self-cognition ($g = 0.14$, $p < .001$) and social support ($g = 0.20$, $p < .001$). This means that mentoring programmes are effective in not only reducing externalising behaviours but also supporting the development of positive, protective attributes.

Tolan et al. (2013) also reported weighted mean effects for different outcomes. In addition to delinquency outcomes, mentoring programmes were found to improve academic achievement (SMD = 0.11, 95% CI 0.03 − 0.31), reduce drug use (SMD = 0.16, 95% CI 0.04 − 0.29) and have a desirable effect on aggression outcomes, which was substantial but not quite statistically significant (SMD = 0.29, 95% CI -0.03 − 0.62).

Moderators and mediators

Raposa et al. (2019) conducted an extensive three-level meta-analysis and reported the relationship between a number of different moderators and the effectiveness of adult-youth mentoring programmes. However, these moderator-outcome relationships are not reported separately for externalising behaviour outcomes and instead are reported for an amalgamated outcome measure. This is not ideal, and future reviews should aim to conduct moderator analyses for specific outcomes, such as externalising behaviours. In summary, the authors report the following significant between-study differences:

- Mentoring programmes with a greater proportion of male *mentee* participants were more effective ($t = 2.19$, $p < .05$).
- Mentoring programmes with a greater proportion of male *mentor* participants were more effective ($t = 2.14$, $p < .05$).
- Shorter meetings between mentees and mentors were associated with greater effectiveness ($t = -1.98$, $p < .05$).
- Programmes where mentors were described as 'helping professionals' were associated with greater effectiveness ($t = 2.34$, $p < .05$).

The gender of the mentee appears to be an important factor in mentoring programmes, as does the gender of mentors. It is particularly interesting that programmes with higher proportions of male mentors were more effective, since Raposa et al. (2019) report that, on average, evaluations had higher proportions of female mentors. Whether or not mentees and mentors were matched based on their gender was not coded as a moderator. This has important implications for future programmes and recruitment strategies, and future reviews should code more information about gender and matching based on gender. These analyses should be conducted for externalising behaviours, or preferably crime and violence outcomes separately. It is possible, based on the current evidence, that mentoring programmes that match male mentees with male mentors are more effective.

There were no significant differences in the effectiveness of programmes in relation to mentee age, ethnicity, or risk at baseline as indicated by single parent households, eligibility for free school meals, poor academic achievement and reports of problem behaviours (Raposa et al., 2019). Similarly, there were no statistically significant differences in the effectiveness of unstructured, semi-structured, or structured mentoring programmes, and no significant difference between mentoring programmes that were described as having a general, academic, behavioural, or psychosocial focus. Also, there was no significant effect of any methodological moderators on programme effectiveness.

In a follow-up meta-analysis to the review published by Raposa et al. (2019), Christensen et al. (2020) found that targeted/problem-specific approaches ($g = 0.25$, $p < .001$) in mentoring programmes were more effective than non-specific approaches ($g = 0.11$, $p < .05$). They concluded that adult-youth mentoring programmes can be effective in improving youth

academic, psychological, and social outcomes, especially when employing targeted approaches that are suitable for the needs of mentees.

Tolan et al. (2013) also conducted a number of moderator analyses and found that the only significant relationship was that mentoring programmes were more effective when mentors were enrolled for 'professional development' purposes (B = 0.21, p < .05) and when programmes included components on emotional support (B = 0.22, p < .05) and advocacy (B = 0.17, p < .05).

Burton (2020) found no differences in programme effectiveness based on mentee or mentor demographics, such as age, sex, or race. Evaluations of cross-age peer mentoring programmes that were implemented in a school setting and in urban locations were associated with greater effectiveness. Programmes with higher levels of adult supervision were also significantly associated with greater effectiveness, as were targeted interventions.

Implementation

Seven process evaluations of mentoring programmes inform the current report: Blazek et al. (2011), O'Dwyer (2019), James-Roberts et al. (2005), McMellon et al. (2016), and Philip et al., (2004), Shiner (2004) and Wadia (2015). Annex 2 gives more details of each study.

James-Roberts et al. (2005), who report on an evaluation of 80 community mentoring programmes across England and Wales, is the most comprehensive of these studies. That report is the main basis for the summary, noting also evidence from other evaluations which confirms or contradicts the report's findings.

James-Roberts et al. report that mentees entered programmes with positive expectations: at baseline, 81% of mentees hoped that mentoring could help stop them from getting into trouble, 76% to help them find new activities, 68% to help them through tough times, and 54% with maths or reading.

The report found that mentoring programmes were successful in meeting these expectations in varying degrees. This finding is consistent with the quantitative evidence reported above and was confirmed by qualitative reports that many young agree that mentoring has helped

them to address socioemotional and academic difficulties (e.g. Blazek et al., 2011). McMellon et al. (2016) note that for some mentees the programme helped in handling troublesome behaviours and also helped them in building their confidence & developing their skills.

But there were several important implementation issues to take into consideration. James-Roberts et al. divide mentoring into the following stages: (1) recruitment of mentors and mentees; (2) screening of applicants for suitability; (3) training of mentors; (4) matching of mentors and mentees and initiation of the mentoring process; (5) mentoring with monitoring and support; and (6) closure. The following implementation issues arose at the different stages.

Recruitment of mentors and mentees and screening of applicants for suitability

Process evaluations show that substantial numbers of children who are referred to the mentoring service do not take up the offer or fail to engage (see Box 1). This is one reason why many potential mentors, who may get trained, end up not acting as a mentor. Attrition of mentors may be reduced by (1) a more accurate assessment of the need for mentees, not just in terms of numbers but also taking into account other factors such as geographical location (lack of transport, especially from rural areas, is mentioned as a constraint on participation in other studies; e.g. O'Dwyer, 2019) , (2) more rigorous assessment of the suitability and commitment of mentors upfront, and (3) being sure mentors are aware of the work required to be a mentor. Mentees appreciate additional activities, in which the project is like a youth club, as something to do and a way to keep out of trouble.

Box 1: National Evaluation of Youth Justice Board Mentoring Schemes 2001 to 2004: an overview

The evaluation covers 84 projects with over 3,000 volunteer mentors. The projects are targeted programmes, with a majority intended for black, Asian and minority ethnic (BAME) participants, and others for children with literacy and numeracy needs. The majority of mentees (79%) were male, with an average age of 14 years, and 69% had a history of offending.

Many projects had the conventional mentoring model of a weekly one-on-one meeting in the community. Others met daily, sometimes in project premises, and the mentor delivered basic literacy and numeracy skills. The programme duration varied from three months to a year.

The study observed improvements for mentees in attendance and behaviour at school, increases in literacy and numeracy, better accommodation and family relationships, and more involvement in community activities such as sports. However, these results are based on before versus after comparisons, with no comparison group, and so cannot be taken as credible evidence of causal effects. Analysis of data from a smaller sample of mentees, compared to a comparison group, found no significant differences in outcomes.

Significant problems in implementation are reported. Half of programmes finished earlier than planned, with many volunteers failing to become mentors. Many young people who were referred to the projects declined to participate or did not to engage with their mentors: just 2,045 of 4,828 young people who were referred to the projects received mentoring. A more detailed study of 11 programmes found that over half the youth who started the programme failed to finish.

Of the 3,400 volunteers, 584 were rejected as unsuitable. Of the remaining 2,820 suitable volunteers, only two-thirds (62%) were matched with mentees. The other third either dropped out during training or could not be matched to a suitable mentee. Also, in some cases the programme recruited far more volunteers than needed, which was a problem that was exacerbated by low take-up by mentees.

Despite being volunteer-based, mentoring programmes were more expensive per young person than the YJB education training and employment (ETE) schemes which had been found to produce similar levels of benefits.

Source: James-Roberts et al. (2005) National Evaluation of Youth Justice Board Mentoring Schemes 2001 to 2004: an overview. London: Youth Justice Board for England and Wales.

Training of mentors

Training comprises (1) information about the project, the mentees and local services for children, (2) skills development, especially listening and non-judgemental counselling skills, (3) discussion and role play dealing with various issues, and (4) do's and don'ts of being a mentor. Training for mentors placed importance on seeing the perspective of the mentee and treating him or her with respect.

Since mentors are volunteers, who possibly do not have prior relevant experience, then training, as well as providing considerable support once they assume their role, is reported to have enabled mentors to feel safe and well equipped to fulfil their roles (Wadia, 2015). Another evaluation also mentioned that all mentors found the training to be both enjoyable and extremely valuable (Mc Mellon et al., 2016).

Matching of mentors and mentees and initiation of the mentoring process

In some programmes, the matching of mentors and mentees takes place through a residential activity weekend. An evaluation of 10 Mentoring Plus projects in the UK described these weekends as somewhat chaotic, including dangerous and violent incidents, and so a thorough risk assessment (at least) is needed prior to the event.

A shared background may be important in the matching. Female mentors who were matched with female mentees reported more successful outcomes. Mentors with black or minority ethnic backgrounds were found to be more successful than those with white mentors in improving the family relationships of mentees with black or minority ethnic backgrounds.

Mentoring with monitoring and support

The mentoring process itself depends on the dynamic between mentor and mentee. Several regular meetings will usually be required for the relationship to move beyond meeting for a

chat, and many may not go beyond that. The cue for a deeper relationship is often the opportunity to deal with a particular issue faced by the mentee such as a problem at home. Ideally, a relationship will become more action-oriented in assisting the mentee in school, work and social life, although that appears to happen in only a minority of cases. In the words of one mentee: "She helped me develop social skills which is a major part of it because I used to really struggle like speaking to new people, like even buying new things & stuff like that. I think she helped me a lot with that. I'm mostly ok now with communicating" (quoted in McMellon et al., 2016).

Successful relationships depend upon being able to talk, reciprocity, mutual respect and interest, and having fun (including 'having a laugh' in regular mentoring sessions). A respondent in McMellon et al, 2016, captures the last of these: "If I go & meet him when I'm down I always come out with a smile." And a mentee quoted in O'Dwyer (2019): "I just liked the way she was, like. She talked and had a good personality. She was a nice person. I got on with her from the start."

When mentoring is successful then mentees see the mentor as a trusted friend they can turn to for advice, which is different to the relationship they have with other adults (Blazek et al., 2011). In the words of a mentee quoted in O'Dwyer (2019), "I liked a lot about him. He would listen, was always there, reliable, a good friend and good support, a good help. He was just a great person to be honest."

Where the mentoring occurs can be an issue. Some projects chose unsuitable locations which were either far from the mentee, or where the mentee felt unsafe, possibly because it was on another gang's 'turf'.

It seems that there is often little or no supervision of mentors. Lack of adequate supervision of mentors is highlighted as an issue in the evaluation of the Move on Peer Mentoring Programme (McMellon et al., 2016). Effective supervision of mentors, and other aspects of the programme, may be hampered by high staff turnover and inadequate resources. These problems may also affect delivery of additional services. In the evaluation of ten Mentoring Plus projects, four had closed down before the end of the evaluation.

Termination

Project closure can bring an abrupt end to mentoring relationships. However, even if the project continues, the ending (termination) of mentoring relationships needs to be well managed. If the mentee feels abandoned that may reverse any gains that the intervention has made: "They were just people that I have lost, Susan, I wrote to her, but then she just disappeared. I hate people who just disappear, it is like anything in life, you put so much effort in to it, and it is like why the fuck do you put so much effort in to it and like they disappear" (mentee quoted in Philip et al., 2004).

James-Roberts et al. (2005) make the following recommendations for future mentoring programmes in England and Wales:

- Mentoring programmes should respond to assessments of youths' strengths and needs.
- Programmes should take account of youths' views of their needs, since the largest barrier to access is youth unwillingness to participate.
- Mentoring programmes are more effective when implemented as prevention strategies for at-risk youth, rather than for older youth already engaged in offending behaviours.
- Short and 'one-off' programmes are not likely to make a significant impact, because needs develop as youth age.
- Trust and competency building skills for mentors are a vital component that could be integrated into other professional capacities.

Cost analysis

James-Roberts et al. (2005) found that mentoring programmes in England and Wales were not low-cost, as originally anticipated. Two types of programmes were included in their evaluation, 'BME projects', where Black and minority ethnic youth were specifically targeted for recruitment, and 'LN projects', where youth with literacy and numeracy needs were specifically targeted. Projects that targeted Black minority ethnic youth and youth with literacy and numeracy needs were labelled 'DB projects'.

When cost data was evaluated in 2004 programmes had not been implemented fully. Overall, mentoring programmes cost on average £11,903 (standard deviation = £26,919). BME/DB projects cost on average £20,480 with a standard deviation of £39,176. In comparison, LN projects cost on average £6,364 with a standard deviation of £11,961. James-Roberts et al. (2005) suggested that the main explanation for the differences in cost between BME and LN projects was that LN projects were more likely to be implemented on 'Youth Offending Team' premises and this was associated with reduced cost.

Findings from UK/Ireland

There are no evaluations of mentoring programmes from the United Kingdom or Ireland included in any of the reviews used to inform this technical report. However, the evidence and gaps map contains two evaluations on the effectiveness of mentoring in the UK and Ireland (Dolan et al., 2011; Shiner et al., 2004).

1. *Big Brothers Big Sisters*

Dolan et al. (2011) evaluated the effectiveness of the Big Brothers Big Sisters (BBBS) programme in a randomised controlled trial with 164 children and young people aged 10 – 14 years old in Ireland. Participants were recruited in 2007 and randomly assigned either to the intervention plus youth activities condition or to the control group who participated in youth activities alone (i.e., an alternative treatment control group). There were 84 youth allocated to the intervention condition and of those, 72 were matched with a mentor during the evaluation.

The majority of mentees were Irish-born and had a mean age of 12 years old. Children and young people were most commonly referred to the BBBS programme because they were

identified as being affected by economic disadvantage, had poor social skills or were considered "shy and withdrawn". 51% of the mentees were female and 49% were male. 73 mentors took part, and these were mostly women (55%) and on average 31 years old.

Analysis of implementation data suggests that the supervision of mentors enhanced the implementation of meetings between mentors and mentees (Dolan et al., 2011). Overall, programme staff were seen to be accessible and helpful, but there were possible issues where programme staff also acted as mentors and it was observed that this dual role may enhance implementation fidelity. Staff were also very experienced, which may mean that there was improved efficacy.

Overall, 57% of the mentor-mentee matches were matched for 12 months or more as required, and 57% of matches met for the minimum 4 hours/month or longer. 85% of participants took part in the additional 'youth activities'.

Self-report measures were used to assess the effect of the BBBS programme on several youth outcomes, including, "risk behaviours". In this domain, mentees were asked about their misconduct (e.g., skipping school, hitting others, stealing) and their alcohol and cannabis use. After 24 months, the intervention group scored higher on the misconduct scale (d = -0.05) in comparison to the control group (Dolan et al., 2011). Overall, multiple regression analyses suggested that the best predictor for misconduct was the level of misconduct at time 1 (i.e., at the start of the intervention; B = 0.479, SE = .07) and there was no significant interaction effect for groups and time (B = .006; SE = .006).

2. *Mentoring Plus*

Shiner et al. (2004) published findings of an evaluation study of the British programme: 'Mentoring Plus'. The programme targeted 'disaffected youth' and aimed to enhance education, employment skills and confidence through an adult-youth mentoring programme. The Mentoring Plus programme was implemented across England, in eight London boroughs, Manchester, Bath and Northeast Somerset. Ten projects were evaluated between July 2000 and September 2003 with 550 at-risk youth, 378 of whom participated in the mentoring programme and 172 acted as a comparison group. The control group was composed of young

people who expressed an interest in participating but ultimately did not take part. A large proportion of participants identified as 'Black African/Caribbean'[1].

Desirable effects of the programme were seen in relation to youths' educational attainment and employability skills, but these did not translate into reductions in offending within the timeframe of the evaluation study. The long-term impact of the mentoring programme on youth violence or offending is not known. Shiner et al. (2004) commented that, while decreases in offending were observed among youth in the mentoring programme, there were also reductions in offending among youth in the comparison group. Since the comparison group were youths who had expressed an interest in participating in a mentoring programme, it is possible that these youths had already begun the process of desistance. They concluded that a mentoring programme may be a viable strategy to provide support and guidance during the process of desisting from offending.

What do we need to know? What don't we know?

It would be desirable to update the Tolan et al. (2013) review to include more recent evaluations with delinquency outcomes. The analysis should take into account the high attrition observed in mentoring programmes and address the issue of structured versus unstructured approaches.

Furthermore, research is needed to understand the effectiveness of peer-mentoring programmes on crime and violence.

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Annex 1: Effect size calculation

This annex shows the calculation based on the results and assumptions given in the text. We assume 200 youth, evenly divided between treatment and comparison groups. That means there are 100 youth in the control group and 100 youth in the treatment group. Assuming that 25% of youth in the control group were delinquent or reported externalising behaviours, the mean effect sizes from both reviews can be easily transformed to a percentage reduction in the outcome.

If the odds ratio for the effect on juvenile delinquency is 1.46 (i.e., Tolan et al., 2013), then using the table below and the formula for an OR, we can estimate the value of X. The odds ratio is estimated as: A*D/B*C, where A is the number of non-delinquents in the treatment group, B is the number of delinquents in the treatment group, C is the number of non-delinquents in the control group, and D is the number of delinquents in the control group. Therefore, the value of X is 18.59 in the case of Tolan et al. (2013).

	Non-delinquents	Delinquents	Total
Treatment	100-x	x	100
Control	75	25	100

Therefore, the relative reduction in delinquency is (25 − 18.59)/25 = 25.64%. In relation to the review by Raposa et al. (2019) the value of X is 20.28 and the relative reduction in externalising behaviours is 19%.

The prevalences of juvenile delinquency and externalising behaviours are likely to vary considerably between studies and can be influenced greatly by the type of report (e.g., self-report or peer-report), the behaviours included, or the questions asked (e.g., frequency of externalising behaviours in the past couple of months versus the frequency of externalising behaviours in the past year, or ever). If we were to adjust our assumption that 25% of the control group are delinquent and/or report externalising behaviours, the overall relative reduction in the intervention group is not greatly affected. For example, if we assume that 10% of the control group are delinquent, the 2x2 table would be as follows and the value of X is 7.07 (for the Tolan et al., 2013 review). Therefore, the relative reduction is 29.3% (i.e., (10 − 7.07)/10]*100).

	Non-delinquents	Delinquents	Total
Treatment	100-x	x	100
Control	90	10	100

Similarly, if we assume that 40% of the control group are delinquent, the value of X would be 31.35 (for the Tolan et al. 2013 review) and the relative reduction in delinquency is 21.63%. Given the dramatic difference in the assumed prevalence of juvenile delinquency, the percentage relative reduction does not vary in a similar fashion. Table 2 shows this further.

Table 2

Variation of the relative reduction in juvenile delinquency and externalising behaviours depending on various estimates.

	Tolan et al. (2013) *Juvenile delinquency* OR = 1.46	Raposa et al. (2019) *Externalising behaviours* OR = 1.31
Assumed prevalence	Relative reduction	
10%	29.3%	21.8%
25%	25.6%	19%
40%	21.6%	15.7%

Annex 2: Summary of issues from process evaluations

Overview of process evaluations				
	Intervention	Success factors	Challenges	Young people's views
Blazek et al. 2011	YMCA *Plus one* - early mentoring intervention for young people at risk for crime.	1.Work along with other supportive processes that take place within families and communities, or are pursued by other institutional agencies. (Holistic approach) 2.Careful attention to how mentors & mentees are matched. 3.Long term engagement: Mentoring is understood as a process and not an event or set of activities. 4. Detailed monitoring and supervision of mentors by programme managers. 5.Staff quality (professionalism, commitment& theoretical &practical integrity).	1.Lack of resources (time) 2.Issues in multi-agency partnership 3.Social & environment circumstances which mentoring cannot affect directly 4.Voluntary role of mentors: Programme managers reported that they could not be strict with the volunteer mentors as they were unpaid.	Many young people reported that mentoring was helping them address socioemotional and academic difficulties. Young people expressed their view of mentors as different from how they viewed their parents or other adult family members. Mentors were seen rather as *'friends'*. In terms of what motivated them to join the plus one mentoring project, the majority of young people interviewed stated that they had not been motivated to join in order to make a specific change in their behaviour or situation (such as offending behaviour).

		6.Succesful targeting of young people fitting the scope of the programme. 7.Multi agency partnership (child protection, health, criminal justice & education) 8. Young people's voluntary involvement- no pressure to join. 10.Non-judgemental attitude & unconditional support of mentors.		
Roberts et al. 2005	Community mentoring projects of Youth Justice Board for England and Wales (YJB). The mentor projects were competency focussed and targeted groups of young people who	1.Mentor-mentee matching process: Female mentors matched with female mentees had more successful outcomes. Mentors with Black or minority ethnic backgrounds were more successful than White mentors in improving the family relationships of mentees with Black or minority ethnic backgrounds. 2.Other gains from mentoring such as improvements in the	1.Unwillingness/reluctance from mentees to participate in the programme: 11 % of mentees felt that it had not really been their choice. 2.Drug /alcohol use among mentees. 3.Drop out in volunteers (potential mentors) after recruitment. 4.Drop out among mentees. 5.Not cost effective: Resource intensive.	Young people said they were on the project due tooffending, problem behaviour and educational issues. A small number reported other reasons, including problems at home and the need for someone to talk to and to trust. Of the young people, 89% said that it was their choice to embark on the mentoring scheme and 11% felt that it had not really been their choice.

| | had offended, or were at risk of offending. | young people's attendance and behaviour at school, increases in literacy and numeracy, improvements in accommodation and family relationships, increased involvement in community activities such as sports, clubs, social groups and voluntary organisations at school or in the community. | 6. Administrative issues: (communication barriers found between community projects and statutory Organisations)

7.Lanuage barriers: Where English is not the mentor's first language it has proved a challenge to engage the individuals.

8.Acessability: One of the difficulties has been the mobility of mentors due to the geographical size of the county and lack of frequent public transport in the more rural locations. | At baseline, 81% of mentees hoped that mentoring could help stop them from getting into trouble, 76% to help them find new activities, 68% to help them through a tough time, and 54% with maths or reading.

Other common reasons were improving relationships and making improvements in education or training. Of mentees, 33% hoped that mentoring would help them to get into some sort of training.

At the follow-up, most (73%) thought mentoring had been 'very useful', 18% 'a little useful', 7% 'not sure/don't know', and 3% (two mentees) 'not useful'. Most (80%) would have liked mentoring to continue for longer because they were enjoying it or it was helping them in some way. |

				"I loved going out with her and stuff. I wish I could keep doing it. *He spoke to me, how he wanted to be talked back to. We get on really well, and I can talk to her about anything."*
Mc Mellon et al. 2016	Move on: Peer Mentoring Programme	1.Mentor training: All mentors and all staff spoke very positively about the mentor training and found it to be extremely valuable and, overall, enjoyable. 2.Mentor-mentee matching process: The mentoring service matches vulnerable young people (including those who are care-experienced) with a volunteer mentor. Some mentors, known as 'peer mentors', have experienced the care system or other forms of disadvantage themselves and bring this life experience to matches with care-experienced young people. 3.Flexbility of the programme:	1. Supervision & support from implementing agency (lacked consistency). 2. Balancing the need to provide a consistent service and responding flexibly to the needs of different individuals and matched pairs.	Young participants reported meeting with mentors helped them feel heard& happy. For some, it helped in handling troublesome behaviours. It also helped them in building their confidence & developing their skills. *"If I go & meet him when I'm down I always come out with a smile."* *"She helped me develop social skills which is a major part of it because I used to really struggle like speaking to new people, like even buying new things & stuff like that. I think she helped me a lot with that. I'm mostly ok now with communicating"*

		Move On's mentoring service is flexible to the individual needs of the mentee. 4.Mentor-mentee relationship: All mentees and mentors were able to identify positive outcomes that they attributed to their mentoring relationship. Central to Move On's mentoring model is the "triangle of support", a triangular relationship between the individual mentee, individual mentor and Move On.		
O'Dwyer 2019	La Cheile mentoring services	1.Building a trusting relationship based on mentoring values (providing a listening ear, being non-judgemental, supportive & empathetic) 2.Activities such that focussed on healthy coping, self-confidence enhancement. 3.Space and time for the mentee & exclusive focus on them. 4.Voluntary nature of the program-helped mentors in	1.Issues relating to accessibility: Practical challenges arose in respect of travel and access, suitability of facilities and inability to participate in activities together. Travel to Oberstown, from rural areas in particular, raised issues of time and cost.	Young person mentees who were interviewed were universally positive about their mentors and consistently spoke very highly about them. *"I just liked the way she was, like. She talked and had a good personality. She was a nice person. I got on with her from the start."* *"I liked a lot about him. He would listen, was always there, reliable, a good friend and good*

		building strong bonds with mentees.		*support, a good help. He was just a great person to be honest."*
		5.Mentor qualities-persistence, patience, & attentive.		
Phlip; Shucksmith and King 2004	Covesea Intensive Housing Project, Pinefield Education Project & Dundee Youth-Link Befriending Project	1.Mentor-mentee relationship: Young people described how some relationships progressed through stages to become a mutually supportive one. For others, the discovery that they could confide in an adult made the relationship meaningful. 2.Qualities of mentors: A sense of humour in mentors was deeply appreciated by the mentees. It covered a wide spectrum from sharing a joke, to recognition of a shared sense of humour and a shared capacity to laugh at their own actions. Participants often drew on examples of having a laugh to highlight differences between relationships with their mentors and other professionals. Having a laugh was therefore an important	1.Structural constraints: (such as poverty, early &childhood difficulties inequalities in health). 2.Interpersonal issues between key workers. 3.Termination process: Some participants felt that badly managed endings undermined the benefits of mentoring. Some young people expressed a view that they had been abandoned by the project. Some young people expressed anger and disappointment when their befriender moved on. 4.Moving out of the projects or changing living arrangements often brought issues about the nature of mentoring relationships to light.	A number of young people expressed the intention to use their experiences of mentoring in future employment, in bringing up their own children and in developing their own careers. *"It wasn't confidence that made me want a befriender, it was because I needed somebody active and Susan was active. Like we went canoeing, we went to karate and stuff like that, we went to the cinema."* *"It was great, yeah, it was really good to see him, so. Yeah, that was fantastic yeah, you know, he was one of the best befrienders that I have ever had basically, he was really funny, and somebody's personality*

		component of a trusting relationship and symbolised the reciprocity that many participants prized. Other qualities such as being non-judgemental & friendly. 3.Formal closure of the mentoring relationship: Many young people noted a lasting effect and a continuing affection for their mentor, even were the relationship had formally ended. 4. Helping mentees to deal with family issues: Family relationships, particularly relationships with mothers, were highly valued by mentees.		*makes a big difference, and his personality was just* *so good, mm, he was funny he was, mm, he was a laugh, he saw a good side of everything, he saw a funny side of everything basically, he was always optimistic, you know, he was never moody or pessimistic or anything like that, he was always, he was just always great fun to be with."*
Shiner et al. 2004	Mentoring Plus Mentoring disaffected young people	1.Mentoring relationship: Qualities of a successful relationship-reciprocity, being able to talk, *A relationship based on respect rather than authority & being able to have fun.* 2.Educational support:	1.Staff feeling overloaded: Staff reported to having to work unreasonably long hours and having to "*cram stuff in to each day".* 2.Funding: Financial difficulties were identified as an important threat to programme integrity. Some of the project workers felt the programme would have been better	A substantial proportion of the young people recruited to Mentoring Plus felt that the programme had helped them in some way. *"If you come here, they can put you on little courses and stuff, things to do*

| | | In the words of one of the mentors,

"My young mentee, it's helped her a lot and I think it's the education programme that's made her realise that 'yeah I can do things', you know it's got her confidence as well." | implemented and would have a greater impact if funds had been available to provide additional specialist services.

3.Location:
The location of the projects formed a recurring theme in interviews with project workers. Only one of the projects occupied premises on its own and this was considered important by the workers: 'the young people are free to roam about here and that's been fundamental to the success of the project'. The remaining projects shared premises with other community groups and workers voiced concerns that the projects were inaccessible and/or unappealing because they were located a long way from where the young people lived and/or because they were based in unsafe and inappropriate locations.
One of the projects ceased to operate temporarily as it relocated from premises in an area which the workers considered to be unsafe. Another project had to postpone elements of the programme, as its premises were flooded, and another project had to vacate its premises when they were declared unsafe by health and safety inspectors. | *instead of getting into trouble. So, I started coming … Because I thought like going on the way that I'm going on I'm going to go in prison soon, so I thought I don't want to go down that route, I've got to sort myself out … I just thought that [Mentoring Plus] was going to be about like, a place to chill out and people to talk to, people to help out with problems and keep you off the streets."* |

			4. Attitude & Behaviour of mentees: The workers expressed serious misgivings about the 'violent', 'intolerant', 'misogynistic' and 'disrespectful' nature of some of the young people's attitudes and behaviour. Residentials were characterised by an underlying sense of chaos and tension between the young people and adults (both as project workers and mentors). 5.Use of drugs & harmful substances by the mentees.	
Wadia., Parkinson 2015	The informal mentoring project (for offenders leaving prison)	1.Inter-agency partnership: Securing the support of local agencies, including Prison Governors. 2.Training and supporting volunteer mentors: Providing relevant training and considerable support enabled mentors to feel safe and well equipped to fulfil their roles. 3.Management:	1.Transfer of offenders to other prisons. 2.High dropout rate of mentors 3.Delay: There were some security issues involved in enabling mentors' access to offenders in prison, which impacted on the time taken to establish the service. 4.The process of providing mentoring for offenders was complex, lengthy and resource-intensive because: Offenders presented with multiple needs.	Many of the offenders interviewed valued the emotional support they had received from their mentor and some reported that this had helped them feel better about their future and less isolated. *"Just knowing that someone's there whereas before I didn't really feel as if I had anyone to turn to."*

| | | The programme benefited from clear leadership and robust management. | There was a lack of co-ordinated resettlement support for offenders.

Mentoring relationships took time to set up and required considerable input from project staff in order to sustain offenders' engagement. | For some offenders, having a mentor had helped them to feel more in control of their lives.

"My life was spiralling out of control and this makes sure I do what I've got to do and don't slip back to the old ways."

Some offenders described how their mentor had helped them to become more involved in their local community. In addition, some of the offenders talked about re-establishing contact with their family whilst others talked about getting volunteer work.

"They sat me down and told me what I needed to do to get help…getting a solicitor and all that. Now I am getting to see my kids."

The majority of the offenders interviewed felt that having a mentor had helped them to change their offending behaviour. They described how |

| | | | their mentor had shown them a different path to take and had helped them to avoid the triggers that led to reoffending.

"I would be back in prison without them – guaranteed. My way of coping is to reoffend. The minute something goes wrong, I reoffend, I revert to type… But now I know I've got a choice." |
| --- | --- | --- | --- |

Annex 3: AMSTAR Quality Rating

Modified AMSTAR item		Scoring guide	Mentoring		
			Tolan 2013	Burton 2020	Raposa 2019
1	Did the research questions and inclusion criteria for the review include the components of the PICOS?	To score 'Yes' appraisers should be confident that the 5 elements of PICO are described somewhere in the report	Yes	Yes	Yes
2	Did the review authors use a comprehensive literature search strategy?	At least two bibliographic databases should be searched (partial yes) plus at least one of website searches or snowballing (yes).	Yes	Yes	Yes
3	Did the review authors perform study selection in duplicate?	Score yes if double screening or single screening with independent check on at least 5-10%	No	Yes	Yes
4	Did the review authors perform data extraction in duplicate?	Score yes if double coding	Yes	Yes	Yes
5	Did the review authors describe the included studies in adequate detail?	Score yes if a tabular or narrative summary of included studies is provided.	Yes	Yes	No
6	Did the review authors use a satisfactory technique for assessing the risk of bias (RoB) in individual studies that were included in the review?	Score yes if there is any discussion of any source of bias such as attrition, and including publication bias.	Partial Yes	Partial Yes	Partial Yes
7	Did the review authors provide a satisfactory explanation for, and discussion of, any heterogeneity observed in the results of the review?	Yes if the authors report heterogeneity statistic. Partial yes if there is some discussion of heterogeneity.	Yes	Yes	Yes
8	Did the review authors report any potential sources of conflict of interest, including any funding they received for conducting the review?	Yes if authors report funding and mention any conflict of interest	Yes	No	Yes