

Rapid Evidence Assessment of the research literature on the effect of feedback on workplace performance

(main findings)

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Main findings

1. What is meant by feedback?

Feedback is generally defined as information about a person's performance which is used as a basis for improvement. In the domain of management, feedback is referred to 'feedback intervention' or 'performance' feedback', and is often defined as "actions taken by (an) external agent (s) to provide information regarding some aspect(s) of one's task performance." (Kluger and Denisi, 1996).

2. What is the assumed logic model? (How is it supposed to work?)

The assumed logic model performance feedback is based on two theories: social comparison theory (Festinger, 1954) and feedback intervention theory (Kluger & DeNisi, 1996). Social comparison theory suggests that individuals tend to compare themselves with others in order to make judgments regarding their performance. They are concerned not only about their performance in an absolute sense, but also about how they measure up in relation to relevant peers. In addition, this theory posits that individuals have a strong desire to improve their performance when faced with unfavorable comparative information. Feedback intervention theory suggests that when confronted with a discrepancy between what they wish to achieve and the feedback received, individuals are strongly motivated to attain a higher level of performance. The practice of performance feedback therefore assumes that informing an employee about the discrepancies between the organization's standard and his/her current performance – implying that he/she is achieving less than most other colleagues – will motivate the employee to attain a higher level of performance.

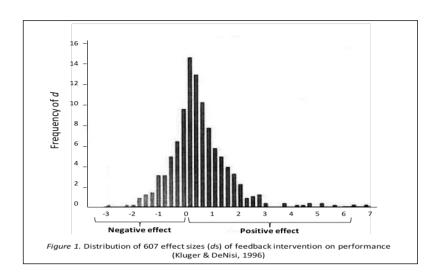
3. What is the overall effect of feedback on workplace performance?

There is strong evidence that feedback can have a large effect on people's learning and performance (level A)

There is wide consensus among both scholars and practitioners that feedback, in general, can have a large, positive impact on a wide range of performance outcomes. As stated above, both social comparison theory and feedback theory posit that providing feedback to people regarding their relative performance can enhance performance. There is indeed strong evidence from controlled studies that feedback is among the most powerful influences on performance. For example, the seminal work of John Hattie that is based on a review of 23 meta-analyses demonstrates large effect sizes (d = .73). In the realm of management, this finding is confirmed by the meta-analysis by Kluger and Denisi (1996). This meta-analysis included 131 controlled studies and was based on 12,652 participants found an average effect size of d = .41

However, the effect sizes reported show considerable variability, indicating that the effect of feedback is contingent upon various moderating factors (level A)

The scientific literature on feedback interventions, however, suggests a caveat. Several researchers have pointed out that feedback may not always be effective. In fact, several meta-analyses have demonstrated that feedback interventions have highly variable effects on performance – in some situations feedback improves performance, but in other situations it has no apparent effect or even harms it (Kluger & DeNisi, 1996; Smither et al., 2005).



Similar results have been reported in meta-analyses of multi-source feedback: some of the studies included reported performance improvements, while some did not, and others reported inconclusive results (e.g. Smither et al., 2005). These findings suggest that the effect of performance appraisal is moderated and/or mediated by several factors. As a consequence, the key question is not 'What is the effect of feedback on workplace performance?', but 'Given the target group, the objectives and the context involved, what are the factors moderating or mediating the effect of performance feedback that need to be taken into account?'

4. What is known about the (positive or negative) effect of possible moderators and/or mediators?

Finding 1: The effect of feedback is moderated by task type (level A)

Findings from a randomised controlled study demonstrate that the effect of feedback on motivation and performance is moderated by task type. Some tasks (e.g., tasks requiring creativity) are perceived as *promotion tasks*, whereas others (e.g., those requiring vigilance and attention to detail) are perceived as *prevention tasks*. It was found that positive feedback increased (self-reported) motivation and actual performance among people working on promotion tasks, relative to negative feedback. Positive feedback, however, decreased motivation and performance among individuals working on prevention tasks, relative to negative feedback (Van Dijk, 2011).

Finding 2: The effect of feedback is moderated by the type of goal (level AA)

Several meta-analyses demonstrate that, goals-setting has stronger positive effects on performance when combined with performance feedback or progress monitoring, especially when the outcomes are reported or made public (Harkin, 2016). However, the reverse is also true: the effect of feedback is influenced by the type of goal. Specifically, feedback is more effective when goals are clear, specific and challenging, but when task complexity is low (e.g. Locke & Latham, 2002, 2006; Brown, 2005; Brown & Warren, 2009; Brown et al 2011; Rahyuda et al, 2014). Goals must therefore be made as difficult but realistic as the individuals can cope with. In addition, goals must be challenging and stimulating the individual motivation. However, when employees need to acquire knowledge or skills in order to perform a task, or when the task involved is complex, then learning goals tend to have a more positive effect on performance than outcome goals (Winters & Latham, 1996; Brown & Latham, 2002; Latham & Brown, 2006; Porter and Latham, 2013). Consequently, in those situations feedback should focus on the (learning) process rather than the (performance) outcome.

Finding 3: The perceived fairness of the feedback has a medium to large moderating effect on performance (level A)

A fair process is widely regarded as a prerequisite for the effectiveness of performance feedback, a construct that in academia is often referred to as procedural justice. This reflects 'the perceived fairness of decision-making processes and the degree to which they are consistent, accurate, unbiased, and open to voice and input' (Colquitt et al., 2013). Empirical research has demonstrated that when procedures are perceived as fair, reactions are favorable, generally regardless of the outcome. This interaction effect is called the fair process effect and has been shown empirically in several studies in different contexts (for a review, see Brockner & Wiesenfeld, 1996). A beforeafter study found that performance appraisal incorporating the principles of fairness and due process tends to positively affect employees' reactions to feedback and their resulting overall job performance (Jawahar, 2010). In addition, a recent randomized controlled study confirmed this finding and demonstrated that employees' perceptions of fairness had an effect on the relationship between feedback and overall task performance (Budworth et al., 2014).

Finding 4: Feedback which provides detailed information leads to a higher improvement in performance (level A)

Findings from randomized controlled studies demonstrate that feedback which provides elaborated, detailed, and specific information leads to a higher improvement in performance (e.g. Raemdonck, 2013; Casas-Arke, 2017). For this reason, task-related feedback is more effective than general feedback (Johnson, 2015).

Finding 5: Negative feedback adversely affects perceived fairness (level C), whereas feedback that focusses only on positive aspects has a medium positive effect on both perceived fairness and overall job performance (level A)

The outcome of a longitudinal study suggests that employees who receive negative performance-appraisal feedback report lower perceptions of fairness. This effect even persists six months after the performance appraisal (Lam et al., 2002). In addition, randomized controlled studies demonstrate that employees who receive feedback that focuses only on positive aspects (such as the employee's strength and accomplishments)¹ perform significantly better on the job four months later than employees who receive a 'traditional' feedback (Murthy, 2011; Budworth et al., 2014). This outcome confirms the findings of meta-analyses in the domain of education that indicate that feedback is more effective when it provides information on correct rather than incorrect responses (Hattie, 2009).

Finding 6: Feedback is less effective when it is perceived as threatening one's self esteem (level A)

A recent longitudinal study suggests that negative feedback is associated with lower self-efficacy improvement. In addition, it was found that feedback is less affective when it is perceived as threatening one's self esteem (Dimotakis, 2017). This finding confirms the outcome of a large number of meta-analysis in the domain of education, showing that low threat conditions allow students to pay better attention to (and follow up on) feedback (Hattie, 2009)

¹ This type of feedback is also known as 'feedforward', see Kluger & Nir, 2010)

Finding 7: More (and more frequent) feedback does not always help improve performance (level A)

Contrary to what is widely assumed, a recent randomized controlled study found that more (and more frequent) feedback does not always help improve performance. In fact, it was found that employees achieve the best outcomes when they receive detailed but more intermittent (monthly) feedback (Casas-Arke, 2017).

Conclusion

Based on the evidence found, we conclude that performance feedback can have large positive effects on work performance, but that these effects are highly contingent upon a wide range of moderating factors, many of which can be managed by effective feedback processes.

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