Depression, fitness and vitamin D

Increased levels of physical exercise have been related to improvements in cognitive functioning and mood in patients with depression. The evidence for sedentary lifestyle and low levels of physical activity in early adulthood being associated with subsequent depressive symptoms is more mixed. Åberg and colleagues (pp. 352–359) examined depressive illness in a large cohort of prospectively assessed male army conscripts, and found that lower cardiovascular fitness at age 18 was a risk for serious depressive illness in later life. They propose that their data offer support for intervening in high-risk groups and also encourage further research into the biochemical consequences of enhanced cardiovascular fitness. An accompanying editorial suggests that depression and cardiovascular disease should no longer be conceptualised as separate entities, but more as intertwined and interrelated diseases, which needs to be reflected in their treatment. De Jonge and Roest (pp. 337–338) suggest that this interaction focuses attention upon the need for personalised medicine, where lifestyle interventions such as exercise may benefit both depression and cardiovascular disease through positive change in their common mediating factors. Vitamin D deficiency is another factor that has been linked with depressive illness through epidemiological studies. Kjærgaard and colleagues (pp. 360–368) replicated the finding of increased depressive symptoms being associated with lower levels of baseline 25-hydroxyvitamin D, but found no change in these symptoms after treatment with high-dose vitamin D for 6 months. They suggest that this indicates that low vitamin D levels are likely to arise as a consequence of depressive symptoms rather than vice versa. However, they acknowledge that they cannot exclude the possibility that this lack of treatment response may be an artefact of not including participants with high rates of depressive symptoms in their sample, inadvertently lowering the threshold for a placebo response. An editorial by Berk & Jacka (pp. 339–341) reviews the difficulty of studies examining risk factors for complex disorders such as depression, but concords with de Jonge & Roest that mental and physical illness and lifestyle are all implicated in complex illness, and that lifestyle may form the common denominator, suggesting a greater focus on lifestyle modification as a component of prevention of psychiatric disorders.

Dementia care and connectivity in psychopathy

Dementia is a common and distressing condition, and coexisting psychiatric and behavioural symptoms are problematic, with significant concerns over antipsychotic prescriptions. Psychosocial interventions have been shown to benefit these symptoms, but implementation has been patchy across different services with little systematic research on their acceptability. Lawrence and colleagues (pp. 344–351) describe a meta-synthesis of the qualitative literature, which identified the importance of individualised interventions tailored to the person, and the full support of care staff in residential settings. Barriers to implementation include pressure on staff time, a focus on priority needs and a preoccupation with risk. They suggest that quantitative and qualitative research need to be combined to show not only what works, but also how and why it works. Orrell (pp. 342–343) places these findings within a wider context in an accompanying editorial, highlighting the promising progress made in applying psychosocial interventions to dementia care. He also points out the obstacles preventing systematic implementation of psychosocial approaches, including the lack of formal manualised training and lack of ongoing resource to support care.