Combining several experimental drugs together, according to research published this week in *The Lancet* medical journal, could lead to more effective treatments for tuberculosis (TB). Prof Andreas Deacon from the University of Stellenbosch and lead author of the *Lancet* paper, said testing novel drugs in combination might do the job within five years. The study found a three-drug cocktail called PaMZ, which included an experimental medicine called PA-824 and two already on the market, was as effective as current TB treatment and could potentially slash the time needed to treat drug-resistant forms of the disease by 80%.

The study, called NC001, found the combination was safe and killed virtually all of a patient’s TB within two weeks. It was also up to 90% cheaper than current treatments for multidrug resistant TB. The phase 2a study, which was funded by the nonprofit Global Alliance for TB Drug Development (TB Alliance) tested different combinations of the experimental drugs PA-824, the rights to which are held by the TB Alliance, and Johnson & Johnson’s bedaquiline; Bayer’s moxifloxacin, an established antibiotic that has not yet been used for TB; and the established TB drug pyrazinamide. PaMZ held particular promise for countries hard-hit by HIV, as it appeared to be compatible with antiretrovirals, said Dr Christo van Niekerk, senior director for clinical development at the TB Alliance. Up to 60% of TB patients also had HIV, and TB-drug regimens containing rifampicin could affect the way patients absorbed anti-retrovirals, Dr van Niekerk said.

kahnt@bdfm.co.za