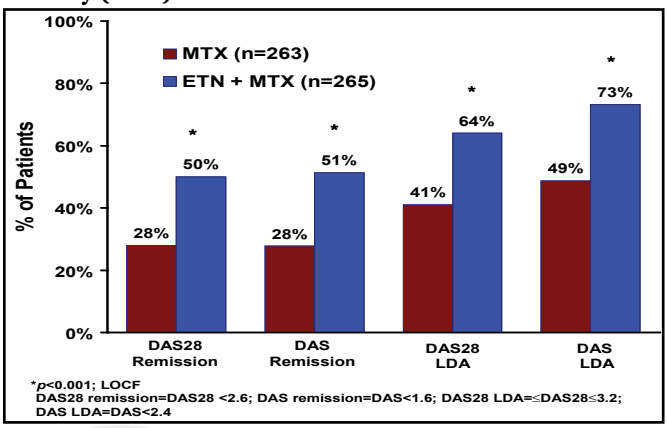
achieving HAQ ≤0.5 was significantly (p<0.001) greater in the combination group (55%, 140/256) versus the MTX group (39%, 93/241).

Figure 1. DAS28 and DAS Remission and Low Disease Activity (LDA).



Serious adverse events were reported by 33 patients (12%) in the combination group and 34 (13%) in the MTX group. There were no differences in the rates of serious infections or malignancies and no cases of tuberculosis or demyelinating disease.

"Until recently, we did not know whether remission was a realistic", said Prof. Emery. "We now have results which show that not only is clinical remission achievable in a significant number of patients, but radiographic and functional remission are also achievable. These exciting results lead to the next therapeutic step in aiming for multiple measures of remission as our treatment goal, no longer just one".

Effect of Previous Bisphosphonate Use on Response to Zoledronic Acid

The HORIZON Pivotal Fracture Trial (NCT00049829) was a 3-year, double-blind, randomized, placebo-controlled trial in which patients received a 15-minute infusion of zoledronic acid 5 mg (n=3889) or placebo (n=3876) at baseline and at 12 and 24 months. Results, previously reported by Black and colleagues, showed that once-yearly zoledronic acid significantly reduces the risk of vertebral, hip, and other fractures [Black D et al. *N Engl J Med* 2007].

Richard Eastell, MD, PhD, University of Sheffield, Sheffield, UK, presented the results of a planned subanalysis from HORIZON that evaluated the effect of prior bisphosphonate use on the primary endpoints of new vertebral fracture (in patients who were not taking concomitant osteoporosis medications) and non-vertebral fractures (in all patients). Markers of bone turnover were also evaluated.

Bisphosphonates had been used by 565 patients (14.5%) in the zoledronic acid group and 557 patients (14.4%) in the placebo group. The duration of the washout period was dependent on previous use (eg, 2 years if previous use was ≥48 weeks).

Over 3 years, the incidence of vertebral fracture was significantly (p<0.0001) lower in the zoledronic acid group versus the placebo group regardless of prior bisphosphonate.

Significant (p<0.001) reductions in the incidence of non-vertebral fractures also were seen in bisphosphonate-naïve patients who were treated with zoledronic acid (n=237, 7.60%) versus placebo (n=337, 10.88%), but not in patients who previously had used bisphosphonates (n=54, 10.11% vs n=50, 9.80%).

Over 3 years, changes in markers of bone turnover were similar between the bisphosphonate use groups. Reductions from baseline at Month 36 in serum levels of c-telopeptides, bone alkaline phosphatase, and N-terminal propeptide of type I collagen with zoledronic acid relative to placebo were 53.8%, 30.0%, and 48.4%, respectively, in the bisphosphonate-naive group, and 49.3%, 16.1%, and 50.1%, respectively, in the previous bisphosphonate use group.

The benefits of once-yearly zoledronic acid that were observed during a 3-year period were robust on vertebral fractures, bone turnover markers, and bone mineral density, regardless of whether patients had previously received bisphosphonate treatment. Zoledronic acid had a favorable safety profile and generally was well tolerated.

The AMBITION Study

Although studies have shown current anti-TNF treatments to be superior to short-term methotrexate (ie, before 24 weeks), none has shown superiority at Week 24. Graeme Jones, MD, PhD, University of Tasmania, Hobart, Australia, lead investigator of the AMBITION study (NCT00109408), presented data that showed that after 24 weeks, tocilizumab (an anti-IL-6 receptor antibody that inhibits IL-6 signaling) monotherapy was clinically superior to methotrexate (MTX) monotherapy in patients with rheumatoid arthritis (RA) who have not failed previous MTX or biologic treatment.