

$$|R'_k|\leq A\frac{2^k}{B_1^{n-1}}\Big(\frac{\Gamma(n-\frac{1}{2})}{m!}\Big)^{1/2}\Big\{\frac{\sqrt{m+1}}{4}|\eta_5|+\frac{\sqrt{(m-1)(m-2)}}{4\sqrt{m}}|\eta_5|+\frac{|1-2\sigma|}{4\sqrt{m}}|\eta_6|\Big\}.$$