In young girls, the occurrence of secretory ovarian cysts may be the first manifestation of Mc Cune Albright Syndrome.

We reported the evolutive profile of 8 young patients with secretory ovarian cyst and peripheral precocious puberty. 5 of the 8 girls present metrorrhagia at the diagnostic. 2 girls had café-au-lait spots (cases 4, 7). No patient had bone lesions detected on the holoskeleton.

On the first episode of cyst, the mean age was 3.8 years (range 2.5 to 7.25 years).

The average diameter of the ovarian cyst was 38.5 mm (range 25 to 80 mm).

The mean estradiol level was 32.5 pg/ml (range 3 to 160). The mean AMH level was 3.35 ng/ml (range 1.9 to 8.7). The rates of E2 and AMH level were not correlated to the diameter of the cyst.

No patient had detected GSα protein mutation by peripheral blood analysis.

5 patients underwent cystectomy (cases 1, 2, 3 and 4). GSα protein mutation was positive on the follicular fluid for 4 cases and negative for 1 case. The cyst spontaneously regressed in the 3 other cases (cases 5, 6, 7).

The mean follow up is 6.6 years. The recurrence of the cyst was noted once (case 7 at 4 yrs), twice (case 4 at 7 and 10 yrs) and 6 times (case 1 at 3, 4, 6, 7, 9 and 11 yrs). This girl with 6 recurrences (case 1) was followed until the age of 27 years, and she had no other recurrence of cyst after 11 years.

Conclusion: Mc Cune Albright syndrome is a sporadic disease with unpredictable evolution. We report here cases of 8 young girls with secretory ovarian cyst. There is no predictive factor of recurrence at the initial diagnosis (AMH, Estradiol, cyst diameter).

We conclude that follow-up is essential after a first secretory ovarian cyst before puberty.