patients required dose reductions, 2 for bone marrow suppression, 1 for tubulopathy (no change in GFR) and 1 patient for reduction in GFR with no change in baseline creatinine (serum creatinine 41, baseline 60). Two patients had isofamidine substituted by cyclophosphamide, 1 for acute kidney injury post nephrotic antibiotic and 1 for hyponatremia secondary to mass effect from the primary tumour. 5 patients had delayed methotrexate clearance (>72 hours) but did not have an abnormal GFR. Out of 244 GFRs completed only 1 result led to a change in treatment.

Conclusion This study demonstrated that despite wide variation in practice between treatment centres there was a very low rate of chemotherapy dose reduction due to abnormal GFR results in the paediatric population. The results suggest fewer formal GFR tests could be performed without compromising patient safety. Instead GFR testing may be best used in the context of risk factors such as known renal disease, a rise in baseline creatinine or concurrent use of nephrotoxic drugs or to complement other less hazardous monitoring tests, such as serial creatinine or creatinine clearance. This would reduce the radiation burden and cost significantly. Data from this study could be used to inform a new guideline for renal monitoring in sarcoma patients which will be discussed at the conference.

Results Further therapy with ATRA was withheld and the hypercalcemia was treated with hyperhydration, diuresis and pamidronate. As a result, the serum calcium level dropped to 12.1 mg/dL (iCa 1.56 mmol/L) and normalized within a week. Hypercalcemia was observed on two more occasions despite a reduced dose of ATRA at 25 mg/m²/day, both documented after the fifth to eighth day of starting ATRA with calcium levels of 15.7 mg/dL (iCa 1.75 mmol/L) and 14.2 mg/dL (1.76 mmol/L) respectively. He was treated successfully with hyperhydration and pamidronate.

On completion of the intensive phase chemotherapy, antifungal prophylaxis was stopped. He is currently on maintenance chemotherapy with ATRA every 15 days, 6-mercaptopurine and methotrexate and till date has not developed hypercalcemia, thus surmising that hypercalcemia may have been precipitated by interaction of ATRA with fluconazole.

Conclusion ATRA metabolism involves liver cytochrome P450 subtypes 2C9 and 3A4. ATRA down regulates interleukin-6 (IL-6) receptors which may have a positive effect on bone resorption and hypercalcemia. ATRA induced severe hypercalcemia is not a very well-known complication. A few cases have been reported, similar to ours, as a result of possible interaction with posaconazole and itraconazole as a cause of hypercalcemia and calcium levels normalized once discontinued. This case further highlights the need to look out for hypercalcemia throughout the treatment of APML as its occurrence is independent of the dose of ATRA as well as the duration of treatment.

**Climate Change Working Group**

**FOR THE SAKE OF OUR CHILDREN – THE WASUP PROJECT (WORLD AGAINST SINGLE USE PLASTIC)**

Aims • Raise awareness of plastic pollution and its dangers to marine animals and potentially humans.
• Education of children in schools
• Litter-picking

Methods In 2017 WASUP was founded. A working group interested in environmental issues was established. A WASUP sign was ‘invented’ and a WASUP song for schools created.

Once WASUP partnered the Canal and River Trust (CRT), 50 schools were contacted and a steering group of teachers formed. This was followed by connecting with the local Council. WASUP was then indemnified, and all involved had to have a DBS check.

In January 2019 WASUP was officially launched with over 300 people from all sectors of the community, including children and teachers from various schools. Presentations were made by various environmental groups.

Then to educate children, an exhibition of their artwork from recycled plastic was held, with prizes to the top 3 schools (figure 1).