

Arithmetic and geometric sequences and series

Student Activity Sheet 2; *Exploring* "Arithmetic sequences and series"

3. In one design for a remodeled auditorium, the seats will be staggered, so that no one's view will be blocked. Complete the table to show the number of seats in a given row.

Row number	Number of seats
1	20
2	23
3	
4	
5	
6	

4. What kind of function can be used to model the data in the table above? Justify your response.
5. What kind of sequence is generated by the number of seats? How do you know?
6. Write a recursive definition for the sequence shown in the table in question 3. Then find a general formula for t_n in terms of n , and use the general formula to find the 21st term.