

# Recommendations for Patients and Families After Growing Rod Surgery: Surgeons Agreement on Post-operative Care

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# Disclosures

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# Introduction

- Kids want to be playful and happy regardless of having growing rods in their back!



- Patients and their families often ask to know about the limitations after GR surgery



# Purpose

- **Recommendations** on post operative care after GR surgery **are variable** among surgeons
- Our study goal is to find out about these **agreements** and **disagreements**



# Methods and Materials

- 21 pediatric spinal deformity surgeons
- A 9-question survey
- Five main topics after GR surgery:
  - 1- Type of activity
  - 2- Duration of physical activity limitation
  - 3- Bracing
  - 4- Pain management
  - 5- Bathing



# Type of Activity

- Mild activities/sports were allowed after index GR

Activity Level	After index GR surgery	After GR lengthening
1-Simple walking	95%	95%
2-Putting clothes on/off	95%	90%
3-Lifting small/light objects	95%	90%
4-Sedentary play	95%	86%
5-Carry light backpack (up to 3lbs)	86%	90%
6-Playing in pool (w/guardian)	76%	90%
7-Swimming	71%	86%
8-General play w/peers	67%	95%
9-biking (w/guardian)	62%	90%
10-Running	43%	81%



# Type of Activity

- **Low- to moderate-impact sports** were allowed after GR lengthenings

Activity Level	After index GR surgery	After GR lengthening
11-Biking (w/o guardian)	29%	81%
12-Low impact sports (basketball/soccer)	29%	71%
13-Carry backpack (up to 10 lbs)	33%	71%
14-Dancing	38%	71%
15-Bending	24%	67%
16-Twisting	29%	67%
17-Heavy lifting	24%	52%
18-Karate/martial arts	10%	33%
19-High impact sports (football, hockey)	5%	24%
20-Gymnastics	0%	24%



# Duration of Activity Limitation

- All (21/21) agreed on a more strict activity limitation after GR index vs. lengthenings.
- After index GR
  - 11/21 (52%): 3-month,
  - 6/11 (29%): 6-month,
  - 3/21 (14%): up to 1<sup>st</sup> lengthening
  - 1/21 (5%): 1-month
- After GR lengthening
  - 11/21 (52%): until the incision heals
  - 9/21 (43%): no restriction
  - 1/21 (5%): until the next lengthening



# Bracing

- 17/21 (81%) advocated TLSO bracing after index GR:
- 29% for 6 months
- 6% for 3-6 months
- 41% for 3 months
- 24% relied on radiographic assessment
- None advised bracing after dual GR lengthening. One advised bracing for single rod lengthening



# Pain Management

- After Index GR:
- 11/19 (58%): A combination of acetaminophen/opioids
- 5/19 (26%) advised opioids only
- 3/19 (16%) advised Acetaminophen only
- 11% (2/21) did not prescribe analgesics.
- Pain management practice following lengthening procedures was similar to index surgery.



# Bathing

- **Sponge bath** (3 days)
- **Shower** (4-5 days)
- **Tub bath** (2-3 weeks).



# Conclusion-Activity

- **Variation exists** among surgeons recommendation for post op care after GR surgery
- **More strict limitation** agreed upon following index GR while a **shorter and more flexible** restriction after lengthenings is recommended.
- **Mild activities/sports** were allowed after index GR, and **low- to moderate-impact sports** were allowed after GR lengthenings.
- **High-impact sports** and **twisting/bending** motions were not advised after any type of GR surgery.



# Conclusion-Bracing

- **Bracing** was generally advised after Index GR surgery for at least 3 months but it wasn't found **necessary** after GR lengthenings by majority of surgeons.



# Conclusion-Bathing

- **Sponge Bathing** can start immediately after GR surgery
- **Oral combined opioid/acetaminophen** is mostly advocated for post-operative analgesia.



# Thank you



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