Addressing Vaccine Hesitations with an Education-Based Booklet
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Purpose
- The aim of this project was to help address the growing problem of vaccine preventable diseases

Background
- Vaccine preventable diseases remain a problem despite affordable and easy access to vaccines in the United States
- 1044 cases of measles have been reported in 2019 from January 1 to June 13, 2019
- Influenza kills an average of 12,000 – 79,000 people per year in the United States
- Lack of evidence-based information, distrust, and fear regarding vaccines has led to decreased vaccination rates

Methods
- Design: Vaccine booklet made available to providers in clinic
- Sample: Caregivers of patients ages birth–18 years meeting inclusion criteria
- Settings: USF Health Internal Medicine and Pediatrics Clinic
- Instruments: EBP vaccine booklet (A Parent’s Guide to Understanding Vaccines)
- Data Management and Analysis: Vaccine rates measured via EMR by category from March through May, 2019

Result
- Post intervention, an overall increase in vaccination rates were demonstrated
- Total vaccinated increased from 622 to 668 patients over three months
- The following results portray the relative difference in vaccine rates:

<table>
<thead>
<tr>
<th>Vaccine</th>
<th>March, 2019</th>
<th>May, 2019</th>
<th>Relative Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>MMR</td>
<td>47</td>
<td>77</td>
<td>63.83%</td>
</tr>
<tr>
<td>IPV</td>
<td>78</td>
<td>91</td>
<td>16.67%</td>
</tr>
<tr>
<td>DTaP</td>
<td>158</td>
<td>165</td>
<td>4.43%</td>
</tr>
<tr>
<td>Meningococcal</td>
<td>30</td>
<td>42</td>
<td>40%</td>
</tr>
<tr>
<td>HPV</td>
<td>6</td>
<td>9</td>
<td>50%</td>
</tr>
</tbody>
</table>

- In an informal interview, providers reported that the vaccine booklet was a valuable tool
- Parents voiced their appreciation for having this information provided to them in an easy-to-read and comprehensive format

Discussion
- By providing evidence-based information regarding vaccinations in an easy-to-read booklet, parents can make a more educated decision regarding vaccines
- The immunization booklet is a parent friendly, easy to understand resource to help recognize the value of vaccines
- The vaccine booklet is now being expanded throughout USF Health and implemented at the 17 Davis clinic
- Further data collection and analysis is warranted in future assessments to measure effectiveness of the teaching material
- Recommendations to assess for further parent understanding should include a pre and post survey tool

Booklet Development
- A widespread literature search revealed causes of vaccination refusals and effective modes of teaching
- Branding through USF Marketing for distribution throughout USF
- Consultation with USF Health providers for most useful content

Limitations
- Vaccination results may not be reflective of booklet education due to factors such as:
  - The booklet was not mandated at USF Health therefore distribution of pamphlet could not be controlled
  - Increased positive scores may not be reflected due to patients that have left USF Health who have received education and subsequent vaccinations
  - Unable to control for patients who have aged out of inclusion criteria during three-month period of data collection

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References
Available upon request.

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