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Clear Dose-Response Signal of Risk of Exposure to COVID-19 mRNA Vaccines Found in VAERS Data

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Editorial

Dr. Jessica Rose's study presents a crucial challenge to the prevailing assumption that repeated COVID-19 mRNA vaccination enhances protection against SARS-CoV-2. Her analysis of VAERS data spanning 2020-2024 reveals a compelling dose-response pattern in the occurrence of breakthrough infections (BTIs), particularly after the fourth dose. The findings indicate that 30% of all BTIs reported in VAERS are associated with the fourth dose, an increase from 16% after Dose 3, 12% after Dose 2, and only 4% after Dose 1. The statistical validation of these trends using Pearson correlation and area-under-the-curve (AUC) analyses confirms that the spike in infections following the fourth dose is an outlier, strongly suggesting that the immune system responds differently to subsequent exposures rather than improving its protective capacity.

The pattern is particularly pronounced in older adults, aged 55-77, who accounted for the largest proportion of post-Dose 4 BTIs. Given the established immunological phenomenon of immunosenescence, wherein aging leads to a decline in immune function, the finding that older individuals are more vulnerable to BTIs after repeated vaccination is deeply concerning. Instead of providing additional protection, multiple doses appear to render this group more susceptible to infection, potentially through immune exhaustion or tolerance mechanisms.

A key hypothesis emerging from Rose's analysis is that repeated mRNA vaccination may induce an IgG4 class switch, shifting the immune response from one designed to neutralize and eliminate the virus to one that tolerates repeated antigenic exposure. IgG4 antibodies, unlike IgG1 and IgG3, are associated with immune tolerance and dampened inflammatory responses rather than robust viral clearance. This suggests that the immune system, rather than being primed to fight SARS-CoV-2, may instead adapt to tolerate its presence, thereby increasing the risk of repeated infections.

Placing these findings in context, Rose's study aligns with other emerging research indicating that mRNA COVID-19 vaccines may be driving unintended immunological consequences. A 2022 study by Irrgang et al. found that individuals receiving multiple doses of mRNA vaccines exhibited a notable shift toward IgG4 antibodies, reaching 19.27% of total spike-specific IgG after the third dose. This shift was associated with

reduced antibody-dependent cellular phagocytosis and complement deposition, both critical mechanisms for viral clearance. If the immune system is being trained to tolerate SARS-CoV-2 rather than eliminate it, this would provide a direct mechanistic explanation for Rose's observation that Dose 4 is associated with the highest rate of breakthrough infections.

Further corroborating this concern, a retrospective cohort study by Shrestha et al. involving 51,017 employees at the Cleveland Clinic found that vaccine effectiveness declined sharply with each additional dose. While the vaccine initially provided some protection during the BA.4/5 wave, reducing infection risk by 29%, this protection dropped to 20% during the BQ wave and became statistically insignificant (4%) during the XBB wave. Most strikingly, individuals with the highest vaccine doses were at greater risk of infection, an observation consistent with Rose's analysis.

Whether mRNA vaccination may be interfering with broader immune function extends beyond SARS-CoV-2. A 2012 randomized controlled trial by Cowling et al. examined the impact of inactivated influenza vaccination on susceptibility to other respiratory viruses, including influenza. The study found that children who received the inactivated flu vaccine were 4.4 times more likely to contract non-influenza respiratory infections than those who did not. This raised the possibility that influenza vaccination may disrupt the immune system's ability to respond to other respiratory pathogens, potentially through mechanisms related to viral interference. However, in Cowling's study, while rhinoviruses and coxsackie/echoviruses were significantly more prevalent in the vaccinated group, no statistically significant increase in coronavirus infections was observed.

The concept of pathogenic priming provides another essential framework for understanding Rose's findings. Pathogenic priming, described in detail by Lyons-Weiler in April 2020, refers to the phenomenon where viral or vaccine-induced proteins contain epitopes that closely resemble human proteins, leading the immune system to mount an autoimmune response against self-tissues upon subsequent exposure. The SARS-CoV-2 spike protein has been found to contain numerous immunogenic epitopes that bear strong homology to human proteins, particularly those involved in immune system function. A detailed analysis of SARS-CoV-2 immunogenic epitopes identified over one-third as having potential autoimmune cross-reactivity with key immune system components, including MHC Class I and Class II antigen presentation pathways, PD-1 signaling, and the ER-Phagosome pathway.

Specific sequences stand out among the spike protein epitopes with the highest potential for autoimmunity. For example, the spike epitope "TLVKQLSSNFGAISSVLNDI" shares homology with attractin-like protein 1, which plays a role in immune cell interactions. Another epitope, "QQLIRAAEIRASANLAATKM," aligns with tetratricopeptide repeat protein 28, a component involved in protein-protein interactions essential for immune regulation. These molecular similarities create a risk where repeated exposure—whether through infection or vaccination—could train the immune system to misidentify and attack its own regulatory pathways. If pathogenic priming is occurring on a large scale, it would provide a strong rationale for why repeated mRNA vaccination is correlating with rising breakthrough infections, as the immune system may be both tolerating the viral antigen and simultaneously damaging its own capacity to mount an effective response.

Given the overwhelming convergence of evidence

pointing to the failure of repeated mRNA vaccination to enhance immunity and the very real possibility that it is actively undermining immune function, it is no longer scientifically or ethically justifiable to continue their administration. The data from Rose's study, combined with corroborating immunological and epidemiological research, indicate that a fundamental reassessment of COVID-19 vaccination policy is required. Given the strong evidence of dose-dependent harm, an immediate moratorum on mRNA-based COVID-19 vaccines is warranted.

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However, given the increased risk of morbidity in the elderly, investigations should be launched into alternative vaccine approaches that do not include the problematic epitopes associated with pathogenic priming. One viable approach would be the development of vaccines that remove immunogenic sequences with known homology to human proteins to reduce the risk of autoimmunity. Furthermore, vaccine formulations with exposure to dendritic cells, not endogenously produced proteins, should prioritize using adjuvants safer than those in current use in other vaccines. A good candidate is as calcium carbonate, which has been shown to enhance immune responses without triggering excessive inflammation or immune dysregulation.

Equally important is the protection of patient and parental rights to informed consent. Individuals must be fully informed of the risks associated with repeated mRNA vaccination, and those who decline vaccination should not be subjected to coercion, penalties, or social ostracization. The principle of informed permission must be upheld, ensuring that medical decisions remain voluntary and based on accurate, transparent, and unbiased information.

The failures of mRNA vaccination cannot be dismissed as anomalies or outliers in the data. They reflect a fundamental misunderstanding of long-term immune dynamics and a failure of public health policy to adapt to emerging evidence. Rather than persisting with a failed strategy, the scientific community and policymakers must acknowledge the risks and take decisive action. The path forward must be one that prioritizes safety, scientific integrity, and the protection of individual rights over institutional inertia and corporate profit motives.

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