

# Rate Limiter - Learning Materials

## Articles & Blogs

- [Rate Limiting Strategies and Techniques](#) - Google Cloud's comprehensive guide on rate limiting patterns
- [How Stripe Builds Rate Limiters](#) - Real-world implementation at scale
- [Kong Rate Limiting Deep Dive](#) - Practical algorithm comparison
- [Cloudflare Rate Limiting](#) - Counting at massive scale

## Videos

- [System Design: Rate Limiter](#) - ByteByteGo's visual explanation of rate limiting algorithms
- [Distributed Rate Limiting](#) - Implementation strategies for distributed systems
- [Token Bucket vs Leaky Bucket](#) - Algorithm comparison with examples

## Technical Documentation

- [Redis Rate Limiting Patterns](#) - Official Redis rate limiting guide
- [AWS API Gateway Throttling](#) - Production throttling patterns
- [NGINX Rate Limiting](#) - Web server level implementation

## Key Concepts to Explore

- Token bucket algorithm implementation
- Sliding window log vs sliding window counter
- Distributed rate limiting with Redis
- Rate limiting headers (X-RateLimit-\*)
- Graceful degradation strategies