

Spesifikasi

Tajuk Templat: Spesifikasi Teknikal : Web Application Firewall (WAF)

Jenis Item: Perkhidmatan

Jenis Barangan: Tempatan

Item	UOM	Kekerapan / Unit Ukuran	Bil. Unit Ukuran Sehari	Bil. Unit Ukuran Sebulan	Kuantiti
	Spesifikasi				
1. Web Application and API Protection (WAAP)	unit	3			2
	1. Brand (Please State Details)				
	2. Model (Please State Details)				
	3. Throughput of 1 Gbps				
	4.Kuantiti: 2				
	5. Virtual Appliance Specifications: The solution must support:- CPU Core: 8 Memory: 16 Gb HDD: 100 Gb - Renewal Period: 12 months (Please specify details)				
	6. SKVMsoftware must be able to support the following hypervisors: · QEMU/ · Vmware · X EN · OpenStack · H yperconverged Infrastructure (HCI)				
	7. Primary Features Web Application and API Protection (WAAP): The solution must support OWASP Top 10 and OWASP API Top 10				
	8. The solution must support the following WAF features including Request check, Response check, Learning, Cloaking, Response				
	9. The solution must support application including access control, Form field inspection, Cookie inspection, WEB DoS protection, HTTP DoS protection, SQL injection, XSS, Inspection avoidance block, WISE Filter				
	10. The solution must support predefined and customize WAF signature				
	11. The solution must support to do protection including Web rewriting protection, credit card account, social security number protection, Response format inspection, Code leakage block and WISE Filter				
	12. Proposed solution must support SQL, Script, Shell code, Access Control, Form Field, and Cookie learning				
	13. The solution must support URL/Server Cloaking and Improper Error handling				
	14. The solutin must suprot API Protection including Mutual TLS (mTLS),				

	Cloaking identification information, API token authentication, Limiting the thresholds of each api, JSON request field test, JSON response cloaking
	15. The solution must support Dynamic Application Proxy to simplify a complex network stack to remove bottleneck points between user and kernel. Please explain in details
	16. The solution must support function CAPTCHA and JavaScript action based authentication
	17. The solution must support Smart Selector which able to sorts web traffic and passes rest of packet quickly to the server to ensure high performance
	18. Proposed solution must support private cloud. Eg, Vmware, Xen, KVM, OpenStack.
	19. Proposed solution must support public cloud. Eg, Amazon Web Service, NHN Cloud, MS Azure.
	20. The solution must support load balancing to avoid bottleneck of a certain CPU core when web traffic is detected
	21. The solution must support Traffic load balancing on the multiple web servers that operate the same web applications
	22. The solution must come with caching function to provide faster web services. Please explain in details
	23. The solution must able to compress content files including image
	24. The solution must able to set QoS to set the threshold for usage-request traffic bandwidth to prevent excessive traffic towards a server
	25. Security Requirements The solution must capable to do a protection against threats such as; Must able to protect against SQL injection
	26. Must able to protect against Command Injection
	27. Must able to protect against XSS
	28. Must able to protect against Cross-Site Request Forgery (CSRF)
	29. Must able to protect against cookie modify
	30. Must able to protect against cookie take over
	31. Must able to protect against directory listing
	32. Must able to protect against DoS
	33. Must able to protect against File upload limit based on file extension
	34. Must able to protect against Upload file content diagnosis
	35. Must able to protect against File size limit

36. Must able to protect against File download diagnosis
37. Must able to protect against Include injection
38. Must able to protect against Error message clocking
39. Must able to protect against Modify hidden field
40. Must able to protect against Parameter modify (tampering)
41. Must able to protect against Web access through tool
42. Protection against Leakage of privacy information
43. Protection against Privacy information Download
44. Protection against Request method limit
45. Protection against Access limit based on extension
46. Protection against Limit forbidden word
47. Protection against Block webpage forgery
48. Protection against Block source code exposure
49. Protection against Block server information exposure that included response header
50. Protection against Block Dos attack based on IP (WEB QoS)
51. Protection against Block Dos attack based on session (WEB QoS)
52. Protection against Duplicate parameter detection
53. Protection against Access control of illegal URL encoding
54. Protection against buffer overflow
55. The solution must support SSL decryption
56. The solution must support performance with 2048 bit RSA key
57. System Administration and Management Requirements: The solution must be able to support Web-based GUI management via the browse
58. The solution must able to automatic updates of version and patches
59. The solution must able to support multiple configuration save slot
60. The solution must able to support server error monitoring
61. The solution must able to provide reporting
62. The solution must able to backup and restore configuration file for fast recovery purpose
63. The solution must support SNMP
64. The solution must support syslog

	65. The solution must support Server Load Balancing			
	66. The solution must support IPv6 Management			
	67. The solution must support IPv6 SSL Offloading			
	68. High-Availability Requirements The solution must be able to support active-standby failover			
	69. The solution must be able to support active-active mode			
	70. Reporting Server Requirement Tenderer must supply reporting software to provide centralized management and logging . VM requirement as per below: - 4 Core - 8GB RAM - 500GB SATA HDD - Analyzer V2 Reporting software			
	71. The solution must be able to support security monitoring and analysis solution via centralized management solution			
	72. The solution must be able to support real-time monitoring and event management			
	73. The solution must be able to supports a variety of report formats with visualized graph and charts to realize a type of attacks and patterns			
	74. The solution must be able to provide log provides you detail information of web packet source, a type of attack, and attack clues			
	75.The solution must be able to supports an email alert whenever breaching user-defined security policy or detecting a certain attack			
	76. The centralized management reporting tools shall be able to provide the reports including: 1. Network Traffic Monitoring; 2. System Resources Usage Monitoring; 3. System Availability Monitoring; 4. Database Monitoring; dan 5. Bandwidth Monitoring.			
2. Perkhidmatan Professional	unit	1		1
	Penyebut harga dikehendaki menghantar dan melaksanakan kerja-kerja pemasangan, reka bentuk, konfigurasi, perundingan, integrasi, migrasi, pengujian dan pentauliahan ke atas solusi yang dicadangkan berdasarkan keperluan pihak Kerajaan.			
	Penyebut harga hendaklah menyediakan dan mengemukakan laporan kerja-kerja professional untuk pemasangan, reka bentuk, perundingan, peruntukan, migrasi, penyepaduan dan pentauliahan yang telah dilaksanakan.			
3. Perkhidmatan Khidmat Sokongan dan Penyelenggaraan	unit	6		1
	Penyebut harga hendaklah menyediakan khidmat sokongan seperti berikut: 24 jam * 7 hari seminggu untuk respons Pengurusan Jauh, Telefon dan Mel.			
	Penyebut harga hendaklah menyediakan perkhidmatan berikut: i.			

	Penyelenggaraan Pencegahan setiap 6 bulan sepanjang tempoh perkhidmatan; dan ii. Menyediakan laporan setiap kali penyelenggaraan dilaksanakan			
	Penyebut harga hendaklah memastikan perkhidmatan berikut: i. Perisian, firmware, OS sentiasa dalam versi terkini (melaksanakan patches dan update apabila perlu) ; dan ii. Membantu dalam kerja-kerja konfigurasi tambahan sepanjang tempoh kontrak ; dan iii. Memastikan aduan diselesaikan dalam tempoh SLA yang akan ditetapkan. iv. Membantu mengaktifkan WAF secondary menjadi aktif dan melaksanakan perubahan failover kepada konfigurasi HA apabila berlaku downtime kepada WAF utama (aktif) untuk mengalihkan trafik kepada secondary WAF			
4. Latihan	unit	1		1
	Petender hendaklah menyediakan latihan teknikal bagi 5 orang pegawai JBPM atau lebih selama sekurang-kurangnya 3 hari di lokasi luar kawasan Putrajaya dan Lembah Klang.			
	SKOP PERKHIDMATAN / AM 1.1 Penyebut harga yang berjaya adalah bertanggungjawab untuk membekal, memasang, mengkonfigurasi, menguji dan mentauliah semua perisian yang dibekalkan serta memastikan perisian tersebut berfungsi dengan baik. Proses ini hendaklah selesai dalam tempoh lapan (8) minggu atau lebih awal dari tarikh surat tawaran setuju terima (SST).			
	1.2 Penyebut harga yang berjaya hendaklah memastikan semua perisian yang dibekalkan mengikut spesifikasi yang telah ditetapkan dengan melengkapkan Jadual Spesifikasi Teknikal Perisian di dalam sistem ePerolehan. Setiap cadangan hendaklah dinyatakan dengan jelas dan hendaklah disokong dengan bukti-bukti yang kukuh seperti dokumen dan sebagainya.			
	1.3 Penyebut harga mestilah membekalkan dan menyelenggarakan lesen perisian yang sah, terkini dan asli dan menyerahkan sijil atau bukti lesen, jaminan (warranty) dan sokongan bagi perisian tersebut kepada JBPM.			
	1.4 Penyebut harga perlulah mengemukakan Jadual Pelaksanaan terperinci bagi pelaksanaan perolehan membekal, memasang, mengkonfigurasi dan menguji perisian seperti di Jadual Pelaksanaan.			
	1.5 Penyebut harga mestilah melaksanakan kerja-kerja pemasangan, konfigurasi, pengujian dan pentauliah perisian di JBPM bagi memastikan perisian dapat berfungsi dan beroperasi dengan baik			
	1.6 Kerja-kerja pemasangan, mengkonfigurasi, pengujian dan pentauliah perlu dilaksanakan secara komprehensif oleh prinsipal/certified engineer.			

	1.7 Perisian WAF yang dipasang, dikonfigurasi dan diuji dengan jayanya perlu dibuat penerimaan akhir sebelum pembayaran dibuat.
	1.8 Penyebut harga mestilah memastikan perisian beroperasi dengan prestasi yang baik sepanjang tempoh jaminan.
	1.9 Penyebut harga mestilah menyediakan borang UAT yang sesuai dan diluluskan oleh pihak JBPM.
	1.10. Penyebut harga hendaklah memberikan jaminan sekurang-kurangnya 3 tahun untuk perisian yang disediakan dan menyediakan perkhidmatan penyelenggaraan pembetulan 12 kali sepanjang tempoh perkhidmatan.
	2. SENARAI PASUKAN PROJEK 2.1 Pasukan Projek Teknikal dan Carta Organisasi - Sila nyatakan jumlah Pasukan Projek Teknikal bagi sokongan teknikal sepanjang tempoh sewaan.dan Carta Organisasi (Sila Nyatakan dengan lengkap)
	3. MEJA BANTUAN 3.1 Menyediakan Carta Aliran proses kerja pengendalian aduan / masalah (Sila terangkan dan lampirkan)
	3.2 Menyediakan bantuan teknikal apabila menerima aduan daripada KERAJAAN dalam masa tindak balas yang dipersetujui. (Sila terangkan)
	3.3 Menyatakan talian khas Meja Bantuan / Pegawai berserta nama, jawatan dan nombor telefon untuk dihubungi (Sila terangkan)