



# Skylake BIOS 설정 가이드

부제 : **tb info bios** 확인 후 기본 바이오스 설정이  
아니면 수정작업에 대한 가이드

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# Supermicro 1019S

항목	설정경로	카카오 권장설정값
Boot Performance Mode	Advanced > cpu configuration > Boot Performance Mode >[ <b>Max Non-turbo performance</b> / power saving / turbo performance]	<b>Max Non-turbo performance</b>
CPU C-States	Advanced > cpu configuration>cpu c-states > [enabled / <b>disabled</b> ]	<b>disabled</b>
HardWare P-States (HWP)	Advanced > cpu configuration > hardware p-states(HWP) > [enabled / <b>disabled</b> ]	<b>disabled</b>
Hyper-threading	Advanced > cpu configuration > hyper-threading > [ <b>enabled</b> / disabled ]	<b>enabled</b>

Intel Virtualization Technology	Advanced > cpu configuration > Intel Virtualization Technology > [enabled / <b>disabled</b> ]	<b>disabled</b>
Turbo Mode	Advanced > cpu configuration > Intel(R) speedstep(tm)을 enable로 바꾸면 Turbo Mode항목 생성 >[enabled / <b>disabled</b> ]후에 speedstep(tm)를 disable로 다시 변경.	<b>disabled</b>
VT-d	Advanced > chipset configuration > system agent (SA) configuration > VT-d > [ enabled / <b>disabled</b> ]	<b>disabled</b>

# Huawei 1288H V5

항목	설정경로	카카오 권장설정값
BootType	Bios configuration > boot > boot type > [UEFI boot / Legacy boot]	Nvme :UEFI 기타 : legacy
C6Enable	Bios configuration > advanced > socket configuration > advanced power mgmt.configuration > cpu c-state control > cpu c6 report > [enable / <b>disable</b> / auto]	<b>disable</b>
CustomPowerPolicy	Bios configuration > advanced > socket configuration > advanced power mgmt.configuration > power policy > [ <b>custom</b> / efficiency / performance/ load balance]	<b>custom</b>
NUMAEn	Bios configuration > advanced > socket configuration > common refcode configuration > numa > [ <b>enabled</b> / disabled]	<b>enabled</b>
PackageCState	Bios configuration>advanced>socket configuration > advanced power mgmt.configuration > package c-statecontrol > package c-state> [ <b>C0C1State</b> / c2 state / c6]	<b>C0C1State</b>

ProcessorAutonomousCStateEnable	Bios configuration > advanced > socket configuration > advanced power mgmt.configuration > cpu c-state control > autocomnomous core c-state > [enabled / <b>disabled</b> ]	<b>disabled</b>
ProcessorC1eEnable	Bios configuration > advanced > socket configuration > advanced power mgmt.configuration > cpu c-state control > enhanced halt state(c1e) > [enabled / <b>disabled</b> ]	<b>disabled</b>
ProcessorEISTEnable	Bios configuration>advanced>socket configuration > advanced power mgmt.configuration > cpu p-state control > EIST(P-state) > [enabled / <b>disabled</b> ]	<b>disabled</b>
ProcessorHyperThreadingDisable	Bios configuration >. advanced>socket configuration > processor configuration > Hyper-Threading > [ <b>enabled</b> / disabled]	<b>enabled</b>

ProcessorVMXEnable	Bios configuration > advanced > socket configuration > processor configuration > VMX >. [enabled / <b>disabled</b> ]	<b>disabled</b>
TStateEnable	Bios configuration > Advanced > socket configuration > advanced power mgmt.configuration > cpu thermal management > cpu t-state control > [enabled / <b>disabled</b> ]	<b>disabled</b>
TurboMode	Bios configuration > advanced > socket configuration > advanced power mgmt.configuration > cpu p-state control > EIST(P-state)를 enable로 바꾸면 Turbo Mode항목 생성 > [enabled / <b>disabled</b> ]후에 EIST(P-state)를 disable로 다시 변경.	<b>disabled</b>
VTdSupport	Bios configuration > advanced > socket configuration > iio configuration > interl(R) vt for directed i/o(vt-d) > [enabled / <b>disabled</b> ]	<b>disabled</b>

# Dell PowerEdge R340

항목	설정경로	카카오 권장설정값
ExtSerialConnector	system bios > serial communicartion > External Serial Connector > [ <b>Serial1 device1</b> /Serial1 device2/remote access device]	<b>Serial1 device1</b>
LogicalProc	system bios > processor setting > logical processor > [ <b>enabled</b> / disabled]	<b>enabled</b>
MemFrequency	system bios > system profile settings > memory frequency > [ <b>maximum performance</b> /2933mhz/~ /maximum reliability]	<b>maximum performance</b>
OsWatchdogTimer	system bios > integrated devices > on watchdong timer > [enabled / <b>disabled</b> ]	<b>disabled</b>
ProcC1E	system bios > system profile settings > C1E > [enabled / <b>disabled</b> ]	<b>disabled</b>

ProcCStates	system bios > system profile settings > C States > [enabled / <b>disabled</b> ]	<b>disabled</b>
ProcPwrPerf:	system bios > system profile settings > CPU Power Management > [ <b>maximum performance</b> / os dbpm]	<b>maximum performance</b>
ProcTurboMode	system bios > system profile settings > Turbo Boost > [enabled / <b>disabled</b> ]	<b>disabled</b>
ProcVirtualization	system bios > processor setting > virtualization technology > [enabled / <b>disabled</b> ]	<b>disabled</b>
SerialComm	system bios > serial communicartion > serial communication > [ <b>on with console redirection via com1</b> /on with console redirection via com2/ on without console redirection /auto/ off]	<b>on with console redirection via com1</b>

SerialPortAddress	system bios > serial communicartion > serial communication > [serial device1=com1,serial device2=com2 / <b>serial device1=com2,serial device2=com1</b> ]	<b>serial device1=com2, serial device2=com1</b>
SysProfile	system bios > system profile settings > system profile > [ <b>custom</b> / performance / performance per watt(os) / workstaton performance]	<b>custom</b>

# eSlim SP7-2104P

항목	설정경로	카카오 권장설정값
Autonomous Core C-State	processor > advanced power management configuration > cpu c state control > autonomous core C-state > [enabled / <b>disabled</b> ]	<b>disabled</b>
CPU C6 report	processor > advanced power management configuration > cpu c state control > CPU C6 report > [enabled / <b>disabled</b> ]	<b>disabled</b>
ENERGY_PERF_BIAS_CFG: Performance	processor > advanced power management configuration > cpu-advanced pm tuning > energy perf bias >ENERGY_PERF_BIAS_CFG mode > [ <b>performance</b> / balanced performance / balanced power ]	<b>performance</b>
<u>Energy Efficient Turbo</u>	=>벤더사에 문의 했지만, 해당 항목을 찾을 수 없습니다. default값이 disabled로 설정되어 있는 것으로 추정됩니다. 제보 주시면 업데이트하여 문서에 반영하도록 하겠습니다.	<b>disabled</b>

Enhanced Halt State (C1E)	processor > advanced power management configuration > cpu c state control > Enhanced halt state > [ <b>disabled</b> / enabled ]	<b>disabled</b>
Hardware P-States	processor > advanced power management configuration > hardware pm state control > hardware p-states > [ <b>disabled</b> / native mode / out of band mode / native mode with no legacy support]	<b>disabled</b>
Hyper Threading Technology	processor > processor configuration > Hyper Threading Technology > [disabled/ <b>enabled</b> ]	<b>enabled</b>
Intel VT for Directed I/O (VT-d)	processor > I/O Configuration > intel VT for Directed I/O (VT-d) > [ <b>disabled</b> / enabled ]	<b>disabled</b>

Numa	processor > common configuration > Numa > [disabled/ <b>enabled</b> ]	<b>enabled</b>
Package C State	processor > advanced power management configuration > package C state control > package C state > [ <b>C0:C1 state</b> / NoLimit / C2/ C6]	<b>C0:C1 state</b>
Performance Profile	processor > advanced power management configuration > power/performance profile > [ <b>custom</b> / maximum performance / minimum power]	<b>custom</b>
<u>Software Controlled T-States</u>	=>벤더사에 문의 했지만, 해당 항목을 찾을 수 없습니다. default값이 disabled로 설정되어 있는 것으로 추정됩니다. 제보 주시면 업데이트하여 문서에 반영하도록 하겠습니다.	<b>disabled</b>

SpeedStep (Pstates)	processor > advanced power management configuration > cpu P state control > SpeedStep (Pstates) > [ <b>disabled/</b> enabled ]	<b>disabled</b>
Turbo Mode	processor > advanced power management configuration > cpu P state control > SpeedStep (Pstates) > pstates를 enable로 변경하면 turbo mode 항목생성 > disable로 변경후 pstates도 disable로 변경.	<b>disabled</b>
VMX	processor > processor configuration > VMX > [ <b>disabled/</b> enabled ]	<b>disabled</b>
VT-d	processor > I/O Configuration > intel VT for Directed I/O (VT-d) > [ <b>disabled/</b> enabled ]	<b>disabled</b>

# HP ProLiant DL360 Gen10

항목	설정경로	카카오 권장설정값
ChannelInterleaving	system configuration > bios/platform configuration(RBSU) > memory options > channel interleaving > [ <b>enabled</b> / disabled]	<b>enabled</b>
CollabPowerControl	system configuration > bios/platform configuration(RBSU) > power and performance options > collaborative power control > [enabled / <b>disabled</b> ]	<b>disabled</b>
EnergyPerfBias	system configuration > bios/platform configuration(RBSU) > power and performance options > energy/performance bias > [ <b>maxperf</b> / balaced power/ balanced performance / power savings mode]	<b>maxperf</b>
InternalSDCardSlot	system configuration > bios/platform configuration(RBSU) > system options > usb options > internal SD card slot > [enabled / <b>disabled</b> ]	<b>disabled</b>

MinProcidlePkgState	<ul style="list-style-type: none"> <li>system configuration &gt; bios/platform configuration(RBSU)</li> <li>&gt; power and performance options</li> <li>&gt; minimum processor idle power package C-state</li> <li>&gt;[<b>No Package State</b> / pakege C6]</li> </ul>	<b>No Package State</b>
MinProcidlePower	<ul style="list-style-type: none"> <li>system configuration &gt; bios/platform configuration(RBSU)</li> <li>&gt; power and performance options</li> <li>&gt; minimum processor idle power Core C-state</li> <li>&gt;[<b>No c-states</b> / c6 state / c1e state]</li> </ul>	<b>No c-states</b>
NodeInterleaving	<ul style="list-style-type: none"> <li>system configuration &gt; bios/platform configuration(RBSU)</li> <li>&gt; memory options &gt;NodeInterleaving &gt; [enabled / <b>disabled</b>]</li> </ul>	<b>disabled</b>
PowerRegulator	<ul style="list-style-type: none"> <li>system configuration &gt; bios/platform configuration(RBSU)</li> <li>&gt; power and performance options &gt; power regulator</li> <li>&gt; [<b>static high performance mode</b> / static low power mode / dynamic power savings mode / os control mode ]</li> </ul>	<b>static high performance mode</b>

ProcHyperthreading	system configuration > bios/platform configuration(RBSU) > processor options > intel(R) hyper-threading > [ <b>enabled</b> / disabled]	<b>enabled</b>
ProcTurbo	system configuration > bios/platform configuration(RBSU) > power and performance options > Interl(R) Turbo Boost Technology > [enabled / <b>disabled</b> ]	<b>disabled</b>
ProcVirtualization	system configuration > bios/platform configuration(RBSU)d> virtualization options > Interl(R) virtualization Technology(Inter VT) >[enabled / <b>disabled</b> ]	<b>disabled</b>
Sriov	system configuration > bios/platform configuration(RBSU) > virtualization options > SR-IOV > [enabled / <b>disabled</b> ]	<b>disabled</b>

ThermalConfig	system configuration > bios/platform configuration(RBSU) > Advanced options > fan and thermal options > thermal configuration > [ <b>optimalCooling</b> / increased cooling / maximum cooling / enhanced cpu cooling]	<b>optimalCooling</b>
hermalShutdown	system configuration > bios/platform configuration(RBSU) > Advanced options > fan and thermal options >ThermalShutdown >[enabled / <b>disabled</b> ]	<b>disabled</b>