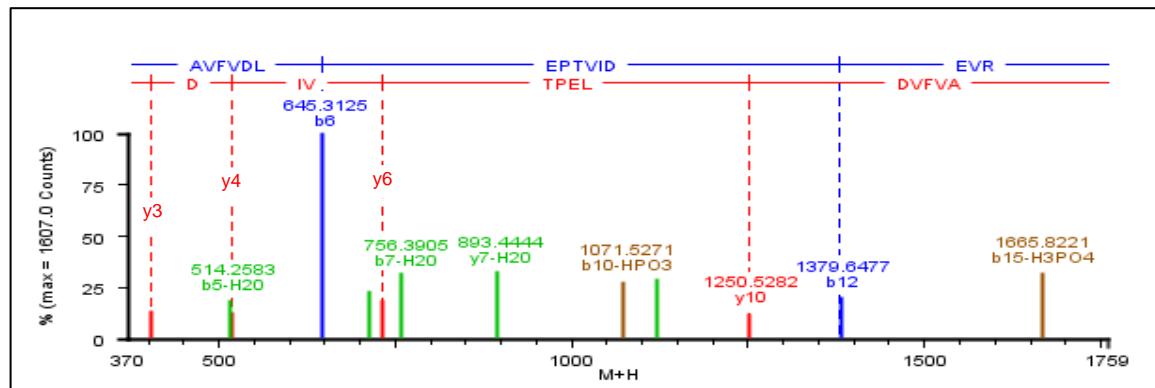


Figure S2. MSMS spectra of modified peptides from human α -tubulin identified in this study

Phosphorylation:

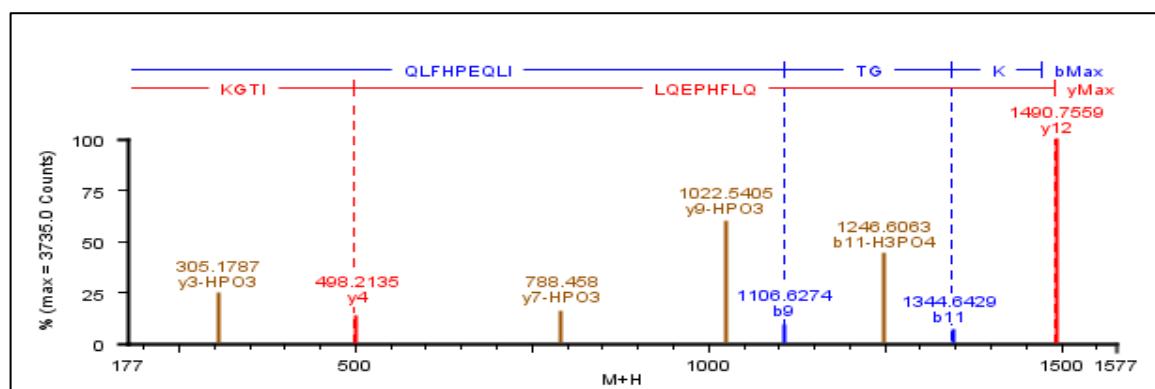
T73

AVFVDLEPpTVIDEVR



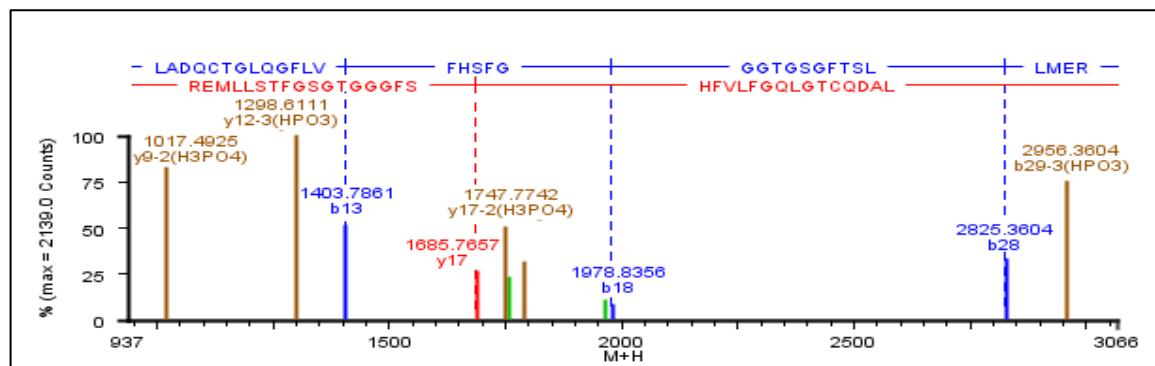
T94

QLFHPEQLIpTGK



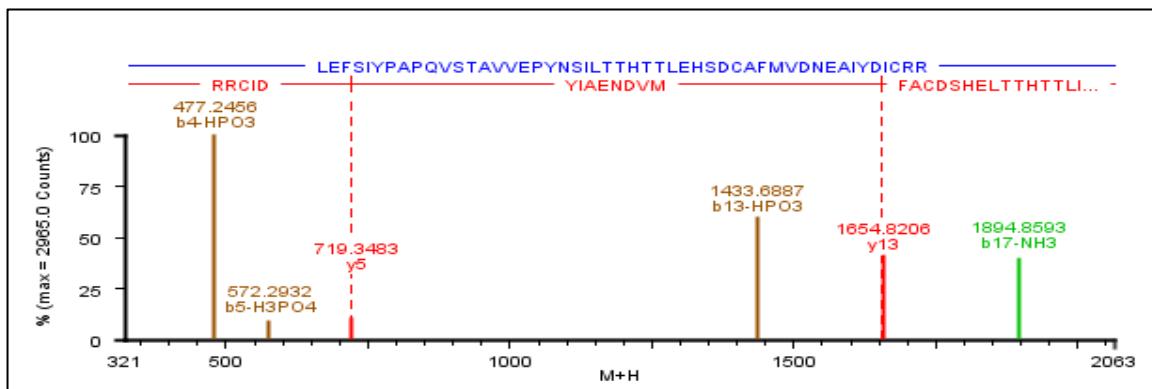
T145, T150, S151

LADQCTGLQGFLVFHSFGGGpTGSGFpTpSLLMER



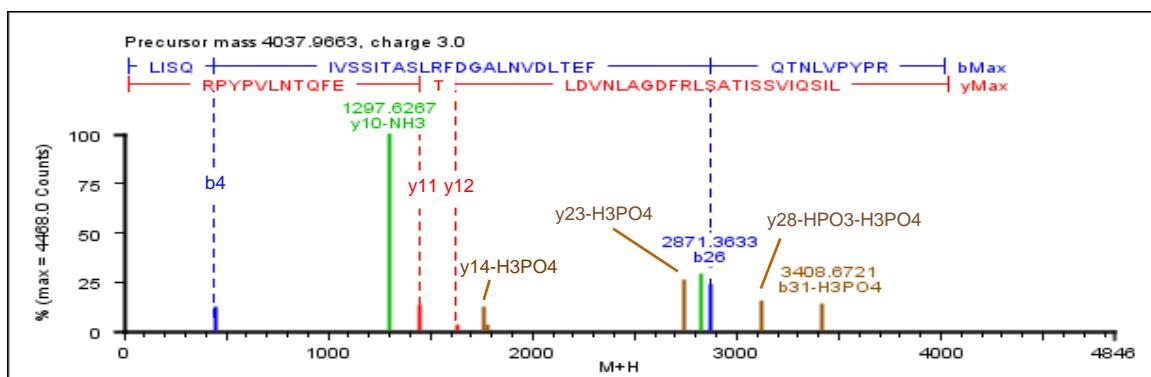
S170, S187

LEFpSIYPAPQVSTAVVEPYNpSILTTHTTLEHSDCAFMVDNEAIYDICRR



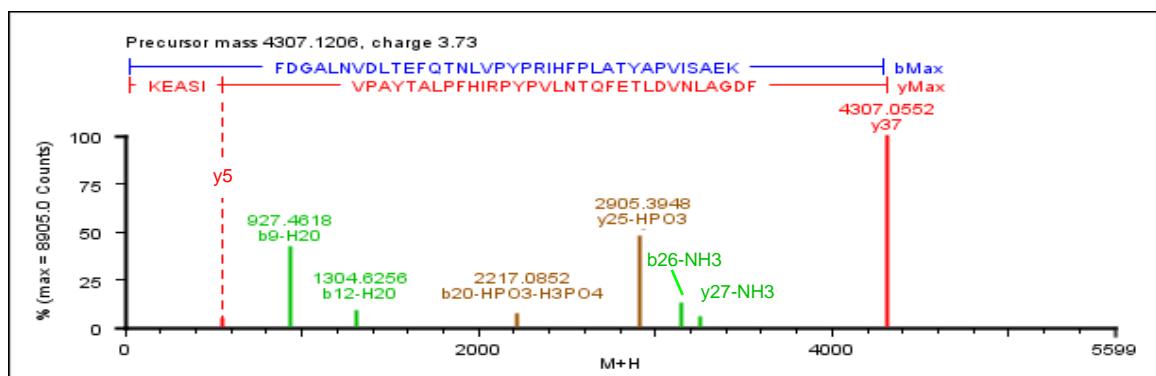
T253, T257

LISQIVSSITASLRFDGALNVDLpTEFQpTNLVPYPR



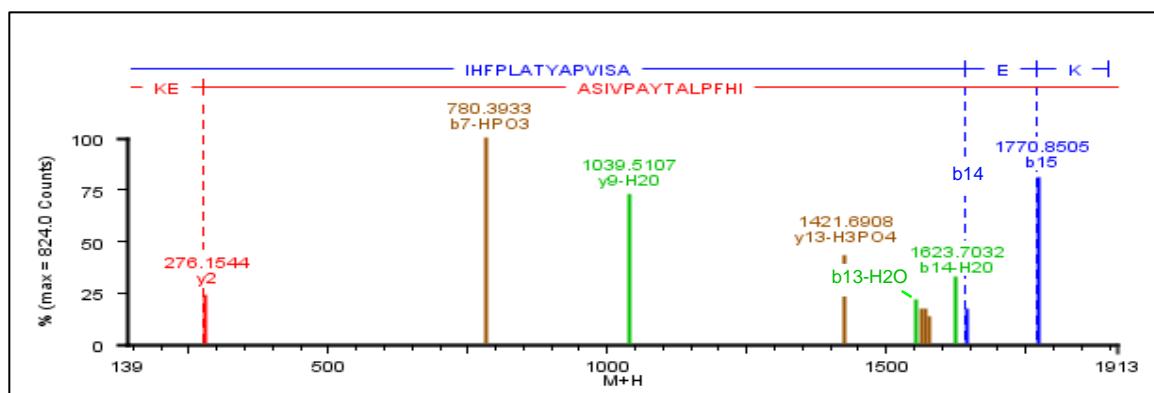
T257, Y262

FDGALNVDLTEFQpTNLVPpYPRIHPLATYAPVISAEK



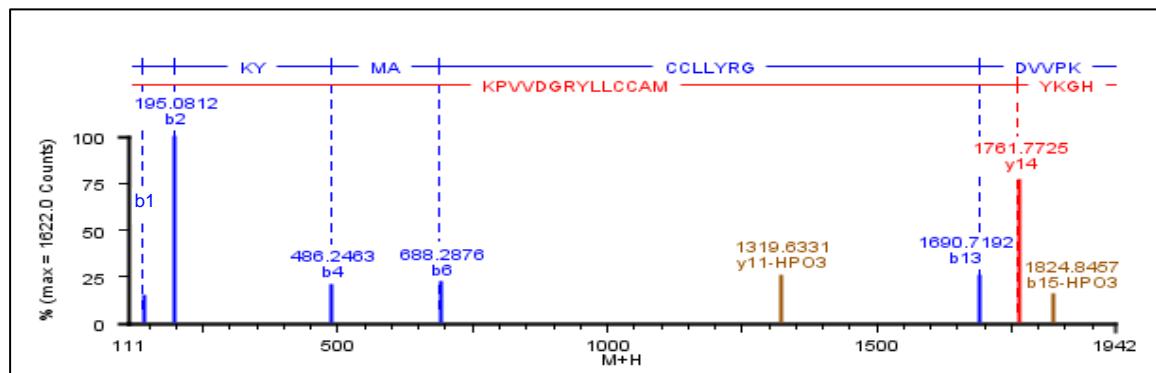
T271, S277

IHFPLApTYAPVIpSAEK



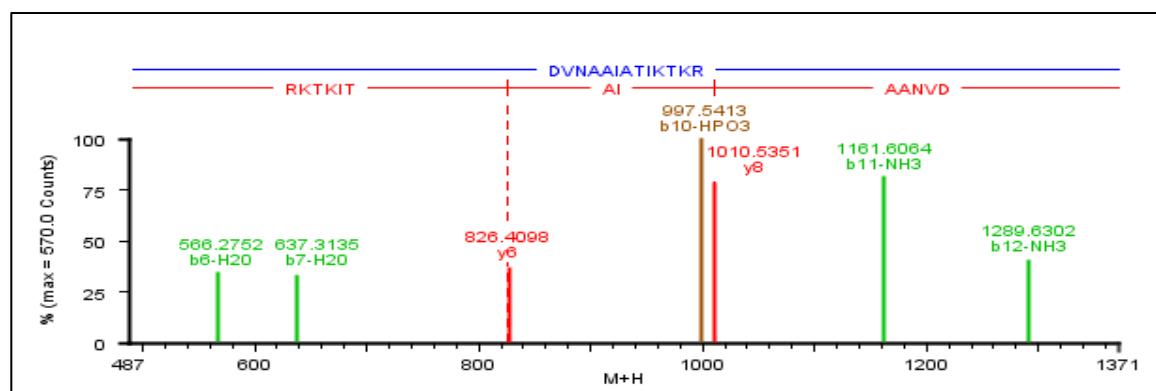
Y319

HGKYMACCLLpYRGDVVPK

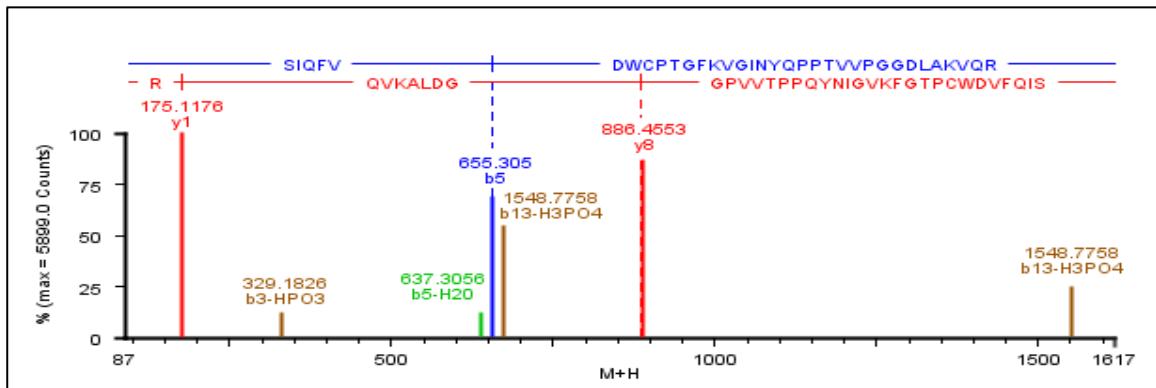


T334

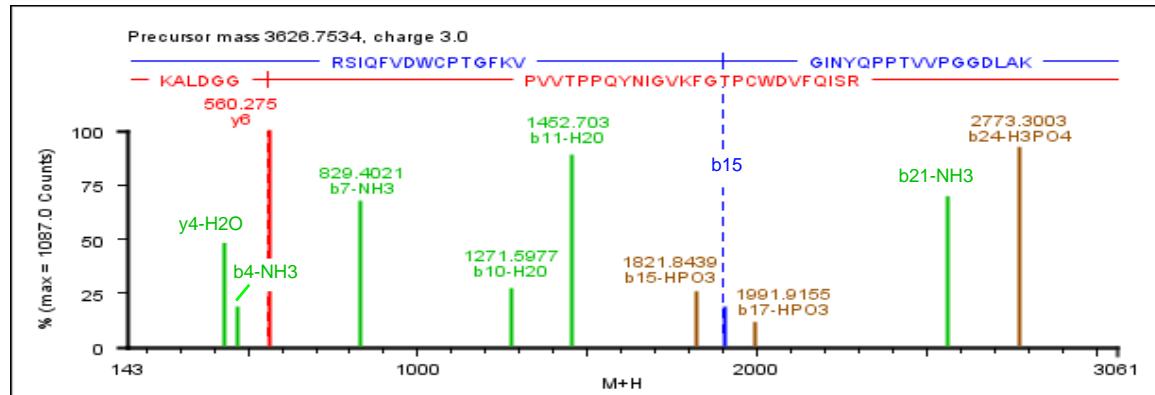
DVNAAIApTIKTKR



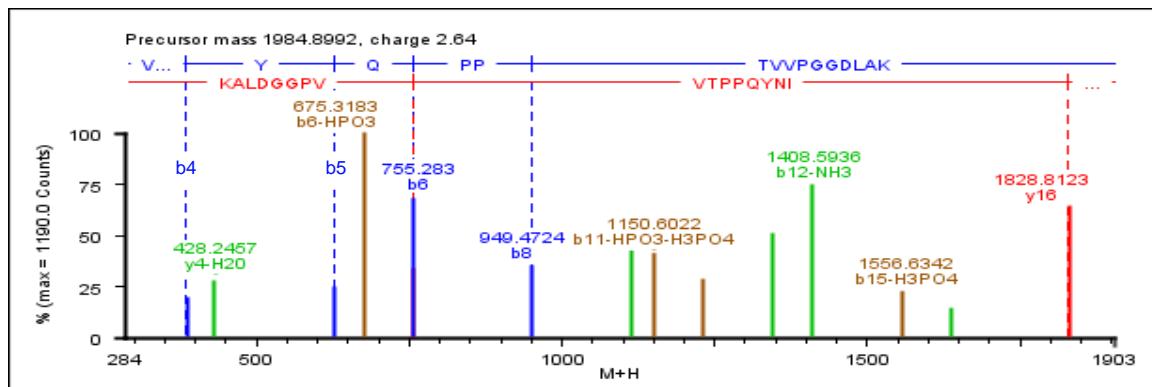
S340

pSIQFV DWCP TGFKV GINYQPPT VVPGGDLAKVQR

T349

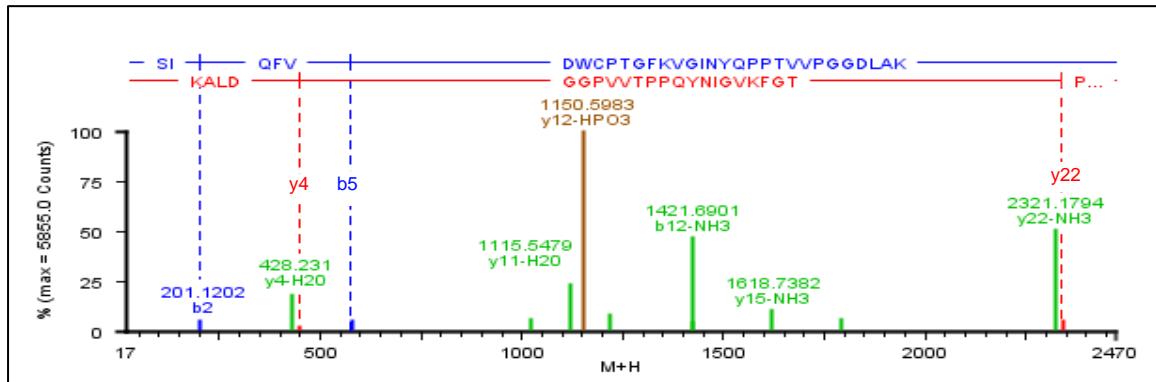
RSIQFV DWCP pTGFKV GINYQPPT VVPGGDLAK

Y357,T361

VGINY pQPPp TVVPGGDLAK

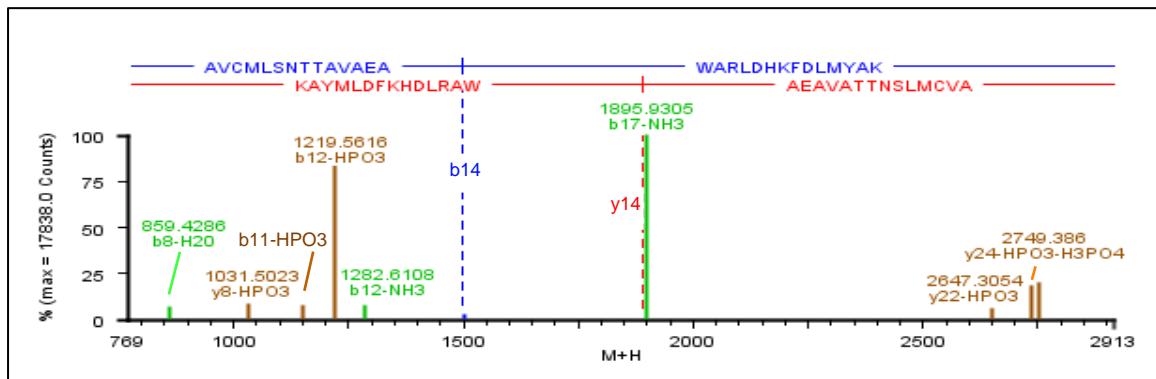
T361

SIQFVDWCPTGFKVGINYQPPpTVVPGGDLAK



T382, Y399

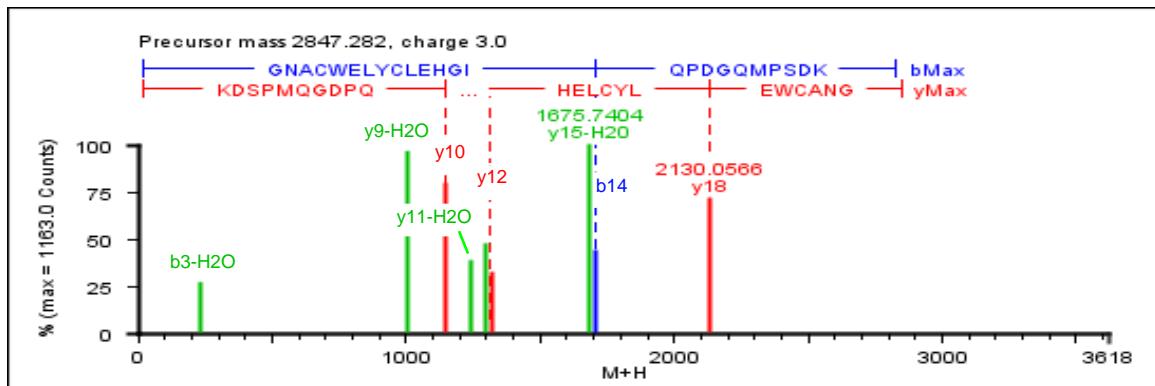
AVCMLSNTpTAVAEAWARLDHKFDLMPYAK



Acetylation:

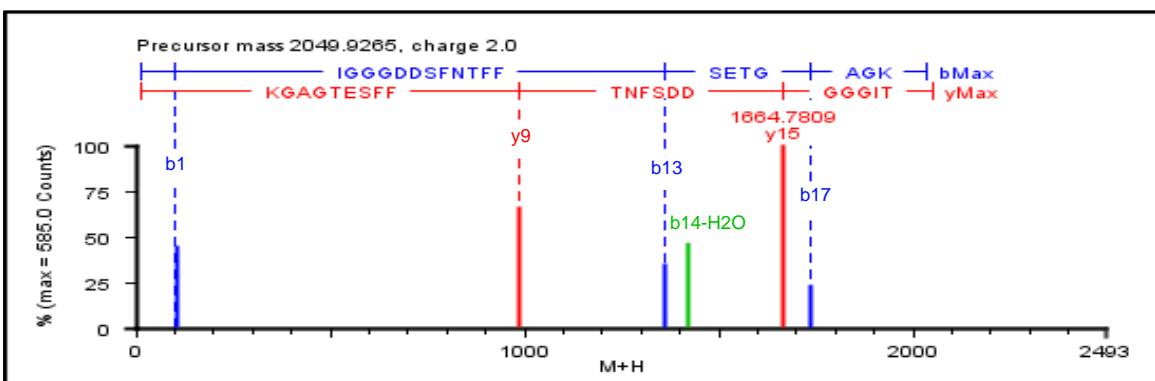
K40

GNACWELYCLEHGIQPDGQMP(SD)K



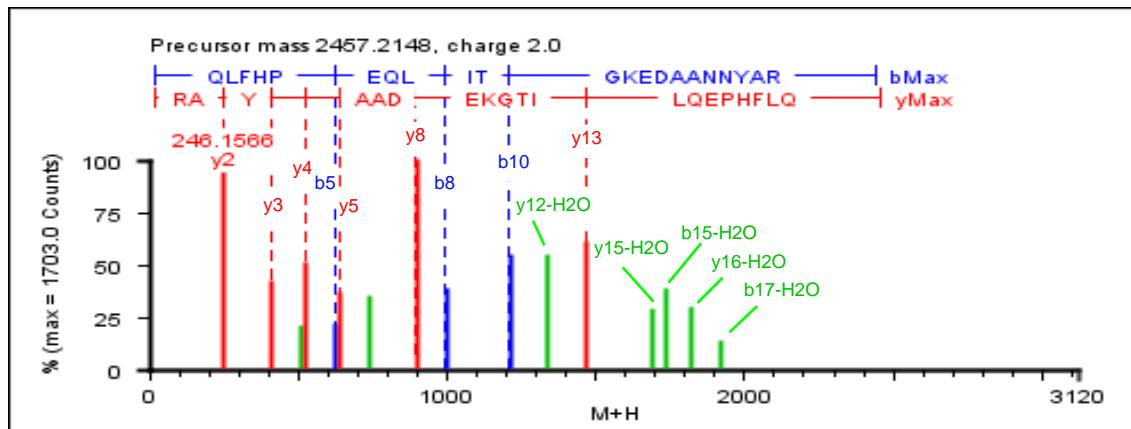
K60

TIGGGDDSFNTFFSETGAG(ac)K



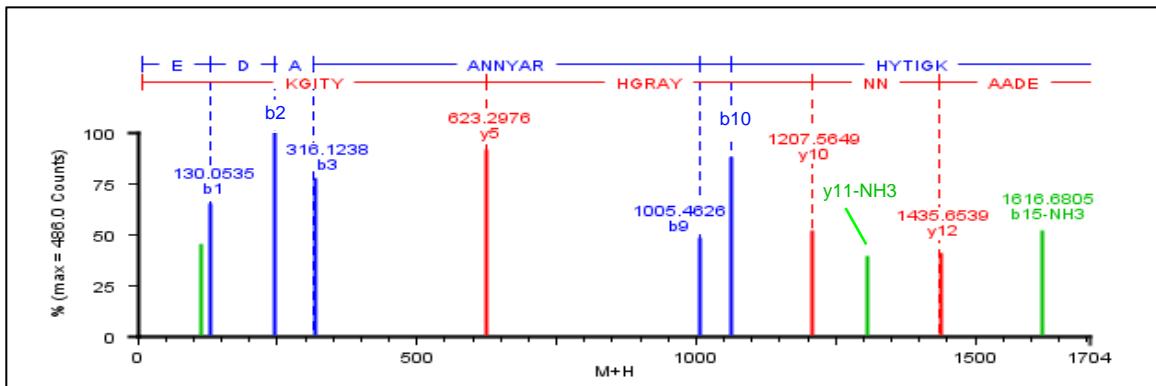
K96

QLFHPEQLITG(ac)KEDAANNYAR



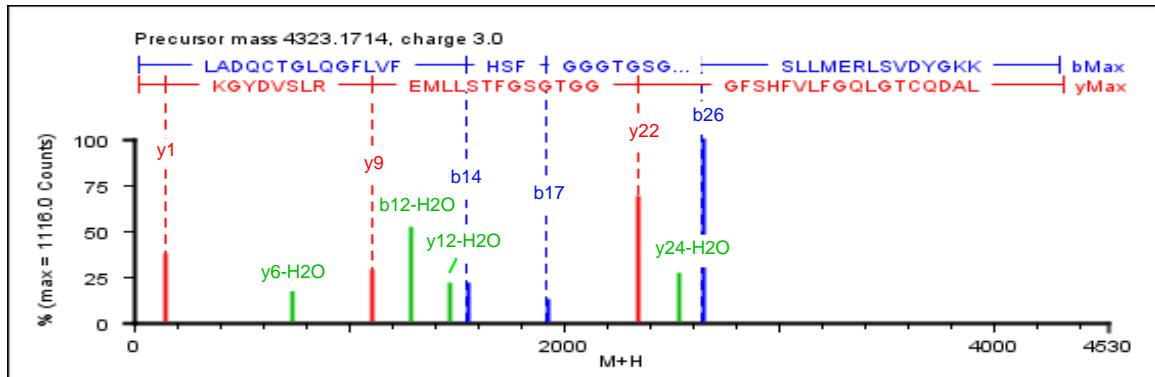
K112

EDAANNYARGHYTIG(ac)K



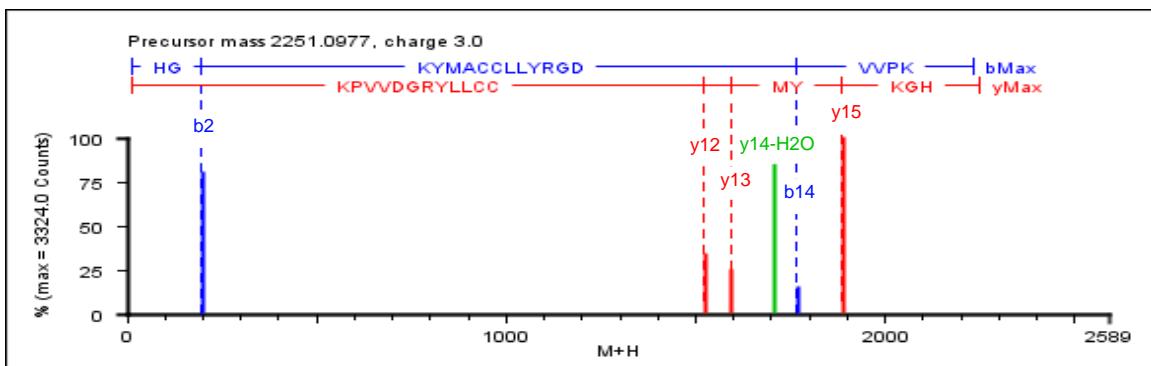
K163

LADQCTGLQGFLVFHSFGGGTGSGFTSLLMERLSVDYG(ac)KK

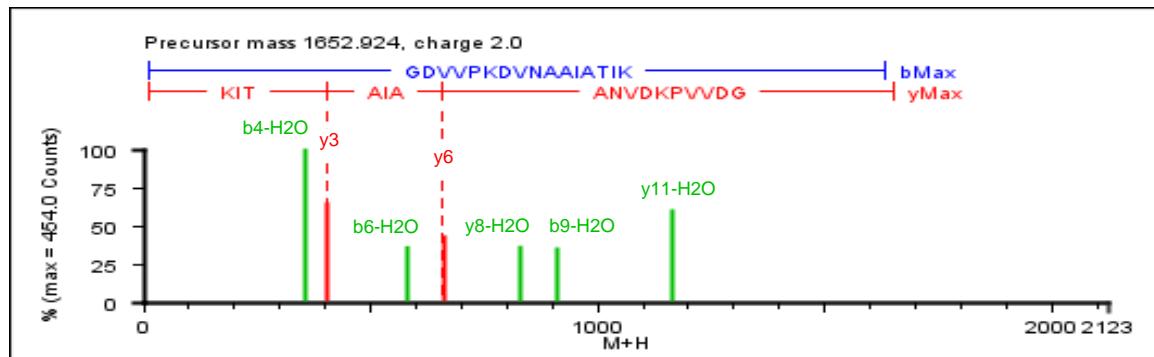


K311, K326

HG(ac)KYMACCLLYRGDVVP(ac)K

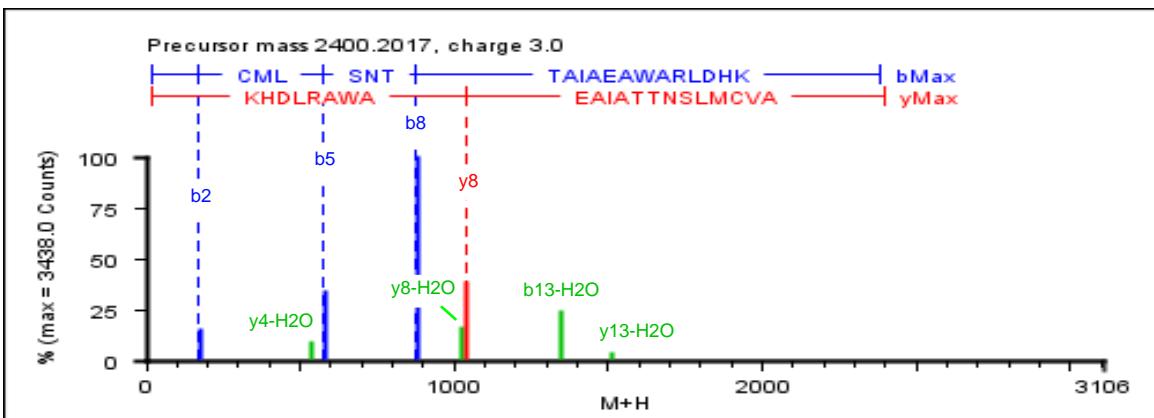


K336

GDVVPKD**V**NAAIATI(ac)K

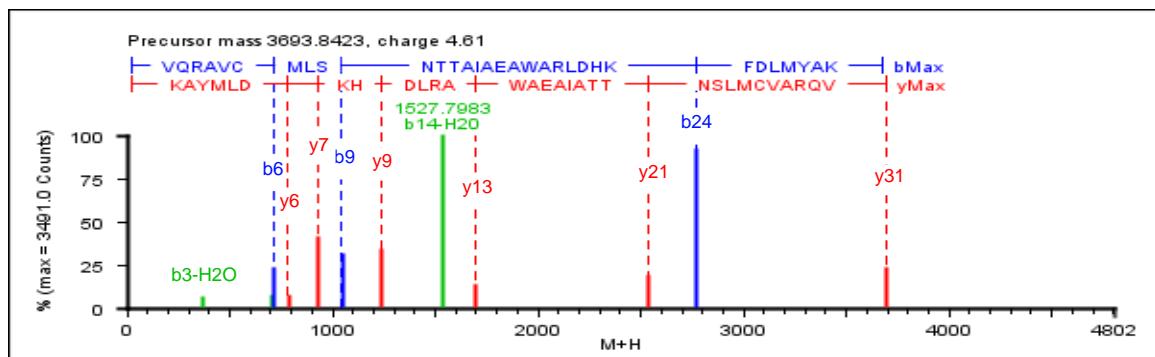
K394

AVCMLSNTTAIAEAWARLDH(ac)K



K394,K401

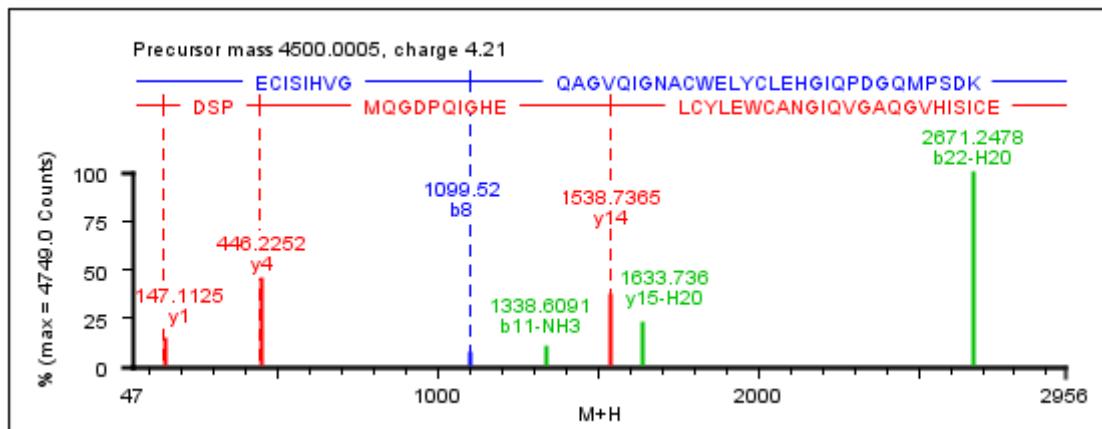
VQRAVCMLSNTTAIAEAWARLDH(ac)KFDLMYA(ac)K



O-GlcNAc:

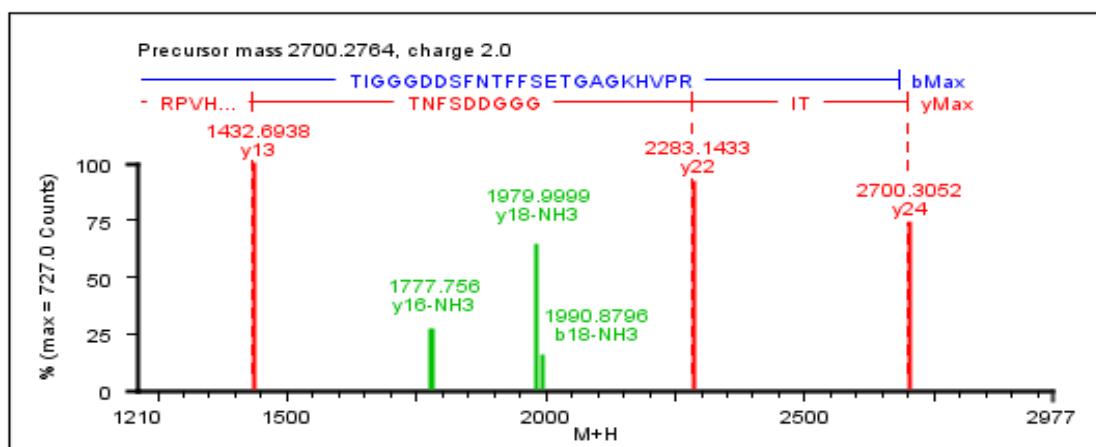
S6

ECI(Og)SIHVGQAGVQIGNACWELYCLEHGIQPDGQMPSDK



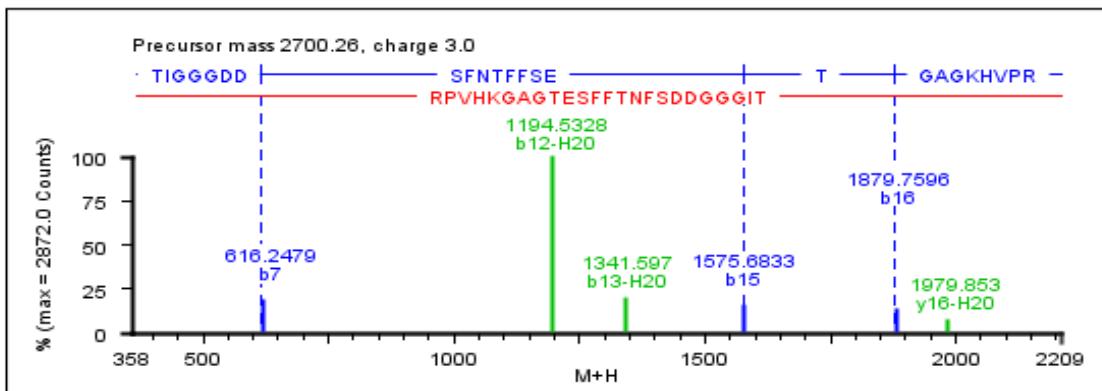
T41

(Og)TIGGGDDSFNTFFSETGAGKHVPR



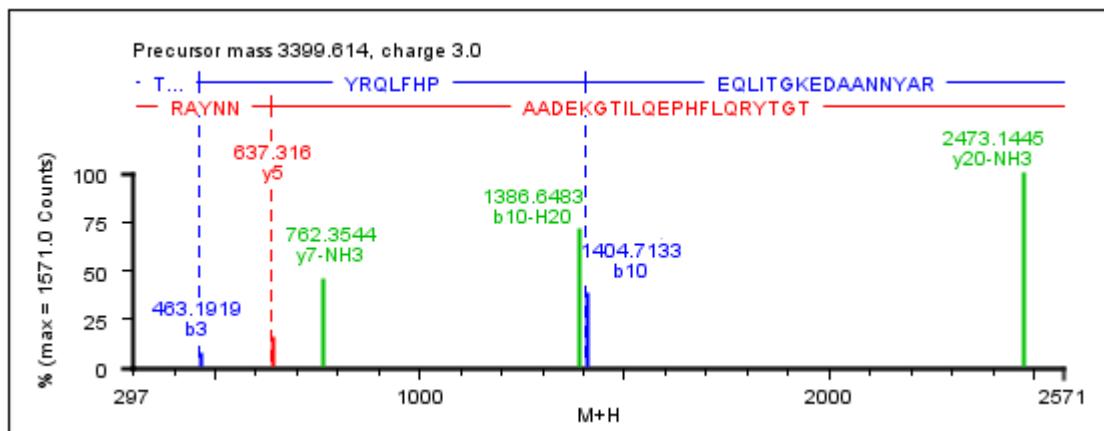
T56

TIGGGDDSFNTFFSE(Og)TGAGKHVPR



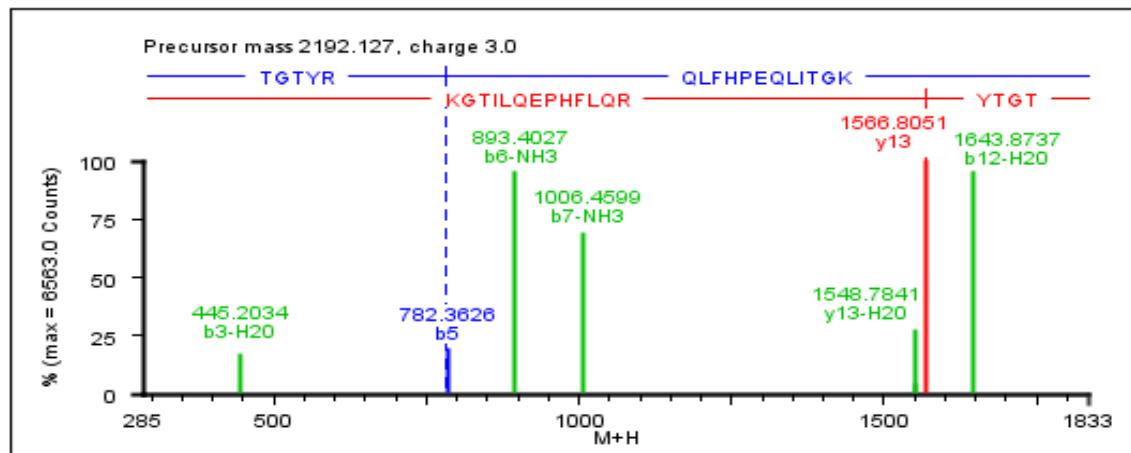
T80, T94

(Og)TGYRQLFHPEQLI(Og)TGKEDAANNYAR



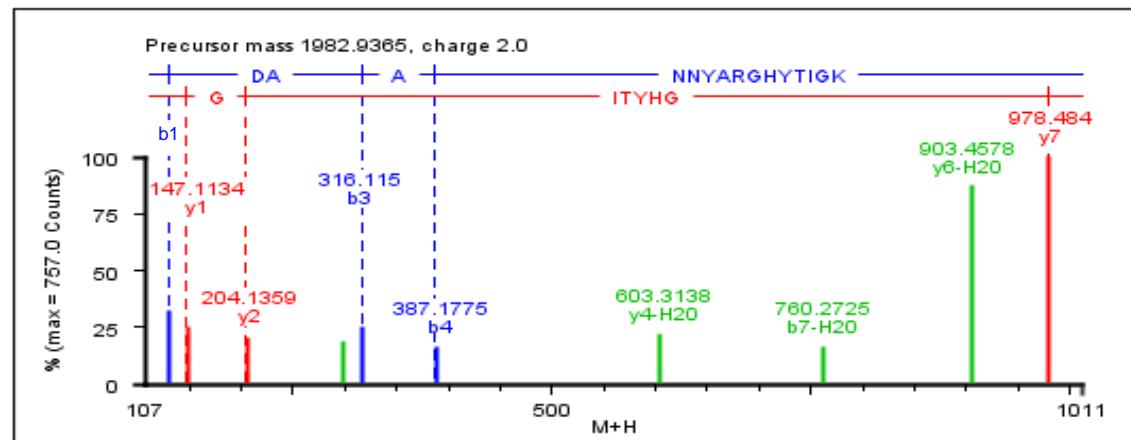
T80

(Og)TGYRQLFHPEQLITGK



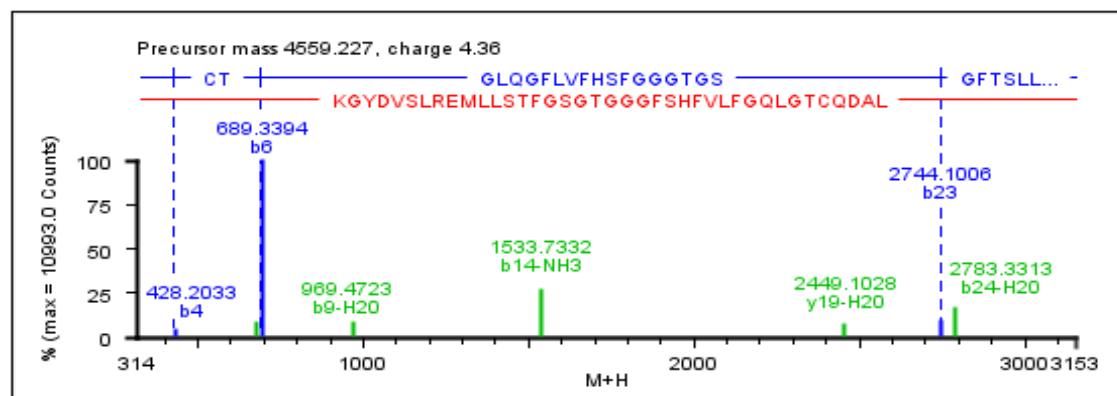
T109

EDAANNYARGHY(Og)TIGK



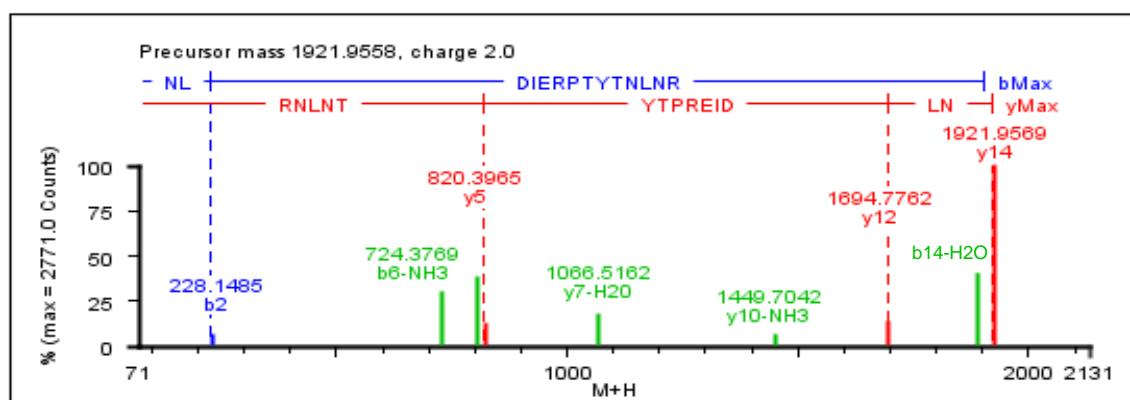
T145, S147

LADQCTGLQGFLVFHSFGGG(Og)TG(Og)SGFTSLLMERLSVDY GK



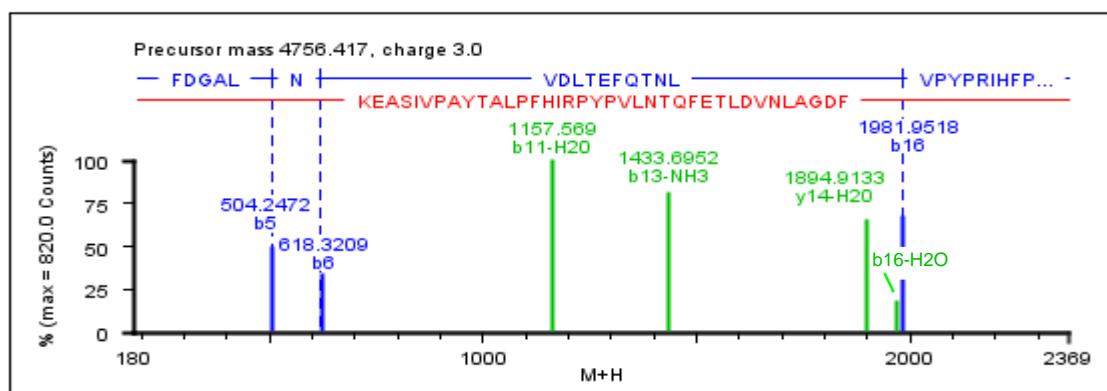
T225

NLDIERPTY(Og)TNLNR



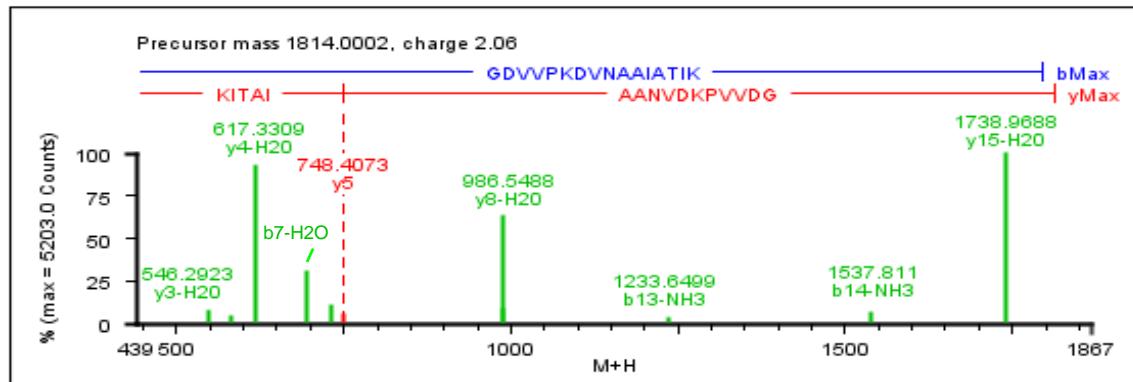
T257, T271, S277

FDGALNVDL(Og)T EFQTNLVPYPRIHFPLA(Og)T YAPVI(Og)SAEK



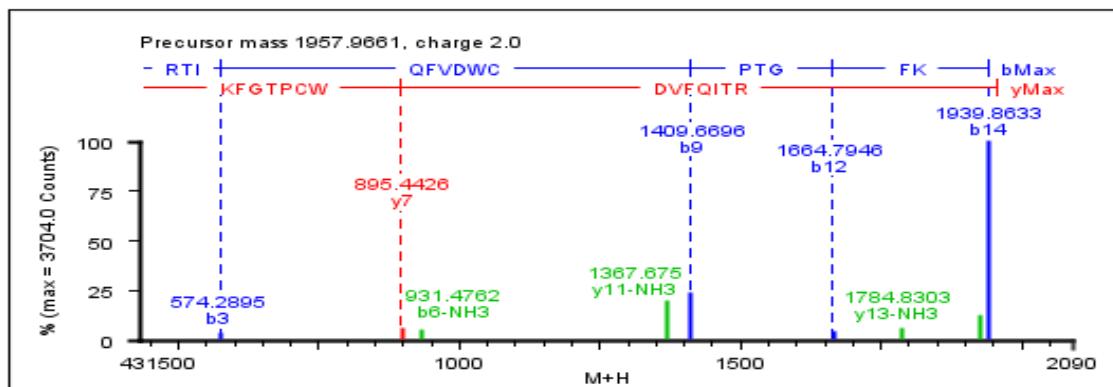
T334

GDVVPKDVNAIAA(Og)TIK



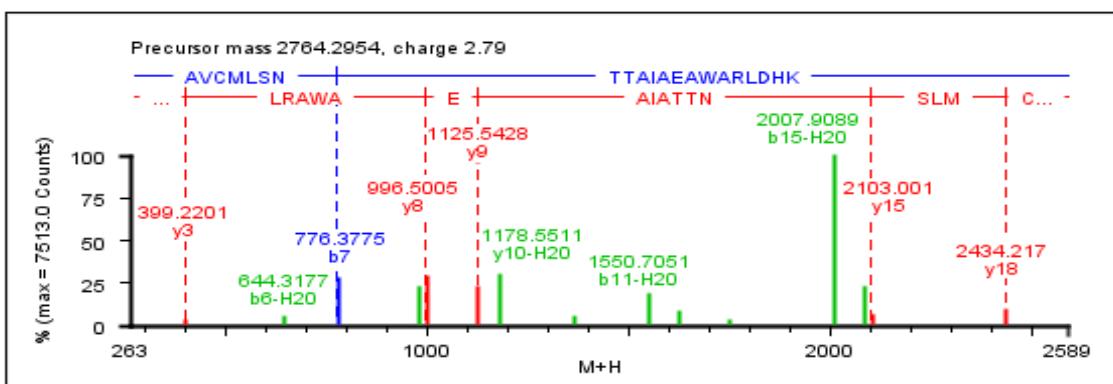
T340

R(Og)TIQFVDWCPTGFK



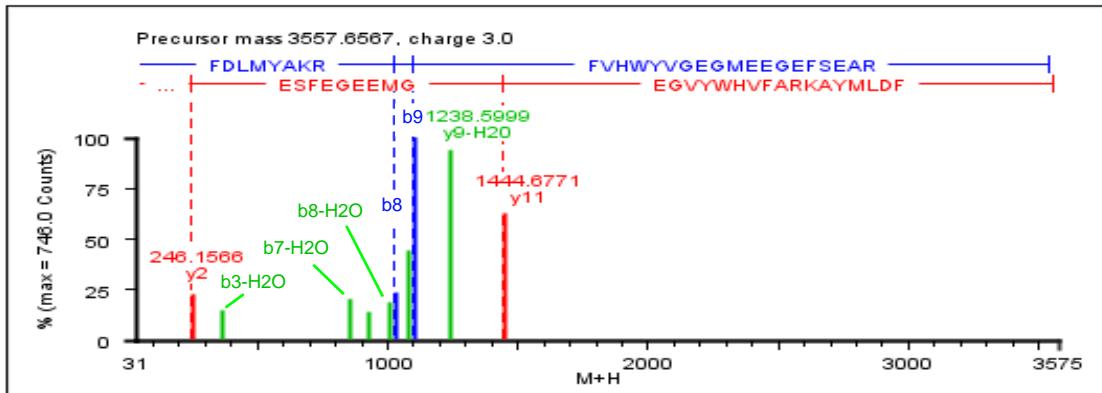
T381, T382

AVCMLSN(Og)T(Og)TAIAEAWARLDHK



S419

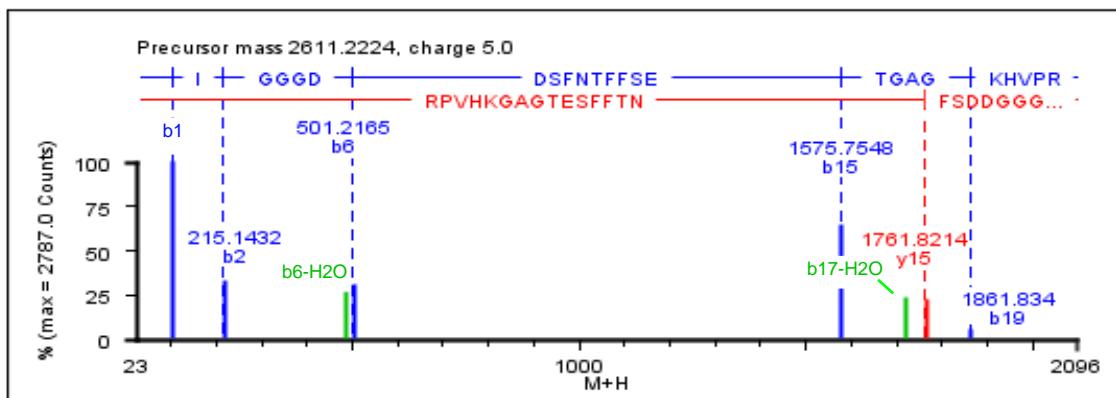
FDLMYAKRAFVHWYVGEGMEEGEF(Og)SEAR



Ubiquitylation:

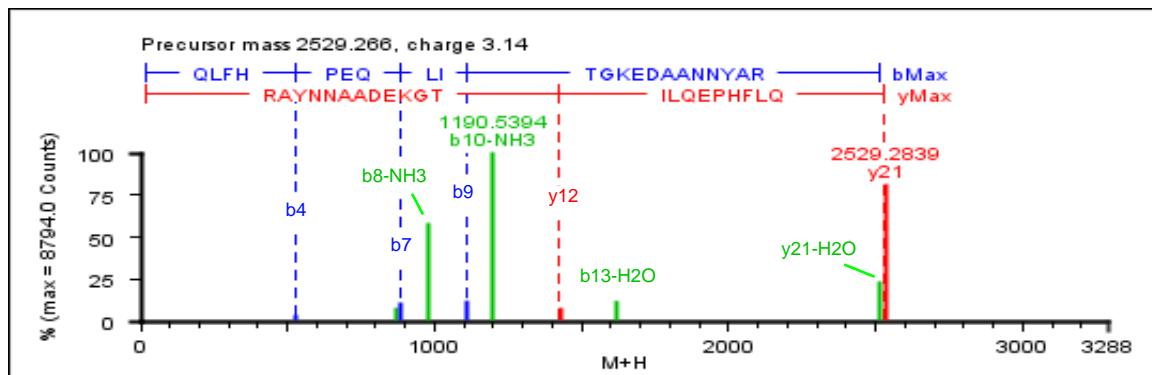
K60

TIGGGDDSFNTFFSETGAG(**Ub**)KHKVPR



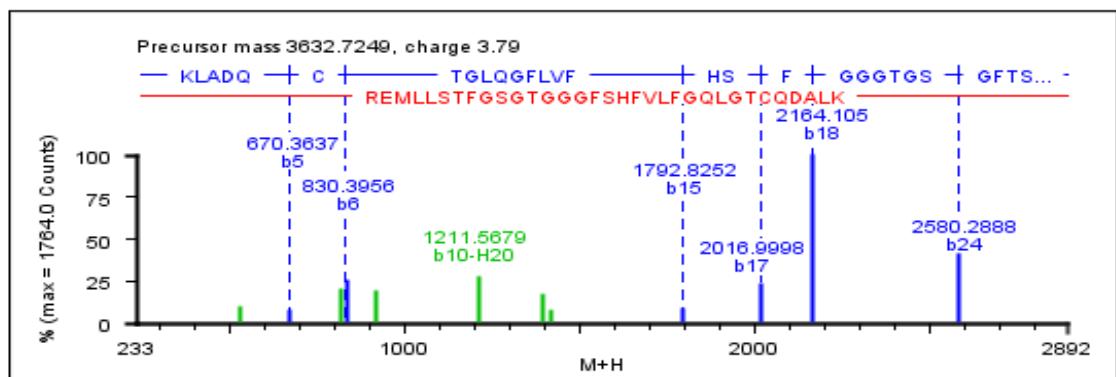
K96

QLFHPEQLITG(**Ub**)KEDAANNYAR

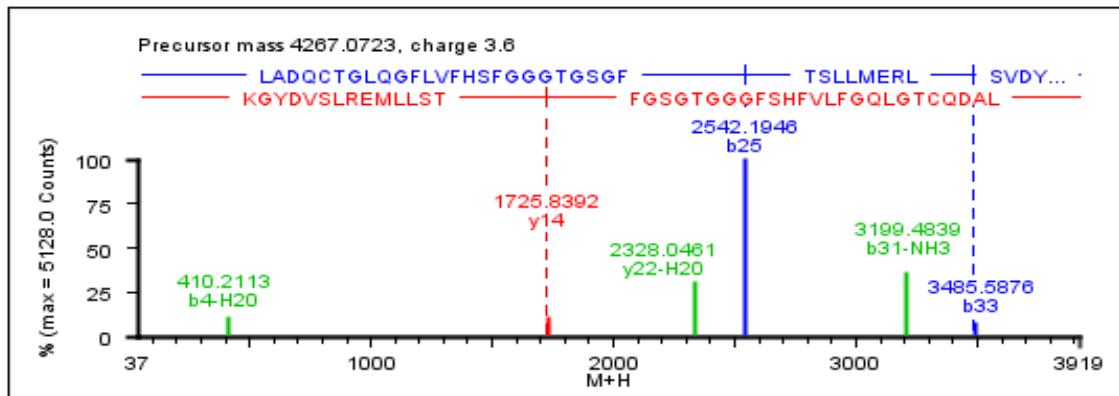


K124

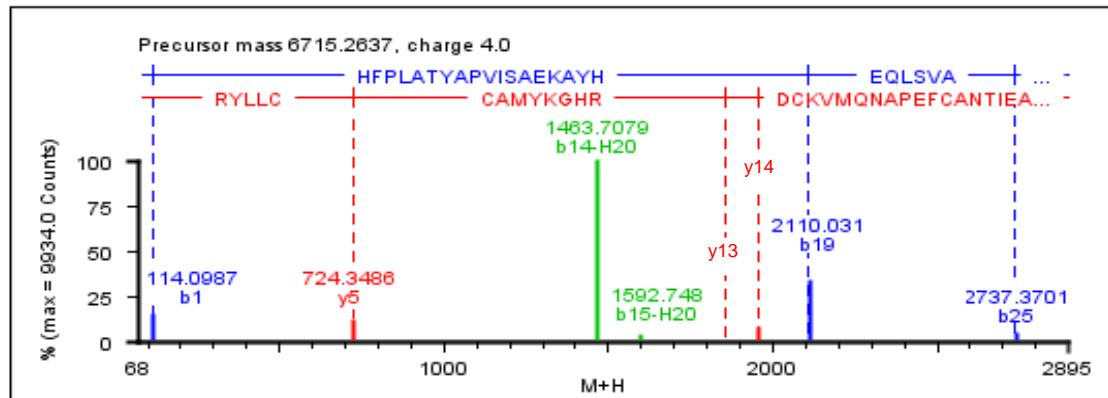
(**Ub**)KLADQCTGLQGFLVFHSFGGGTGSGFTSLLMER



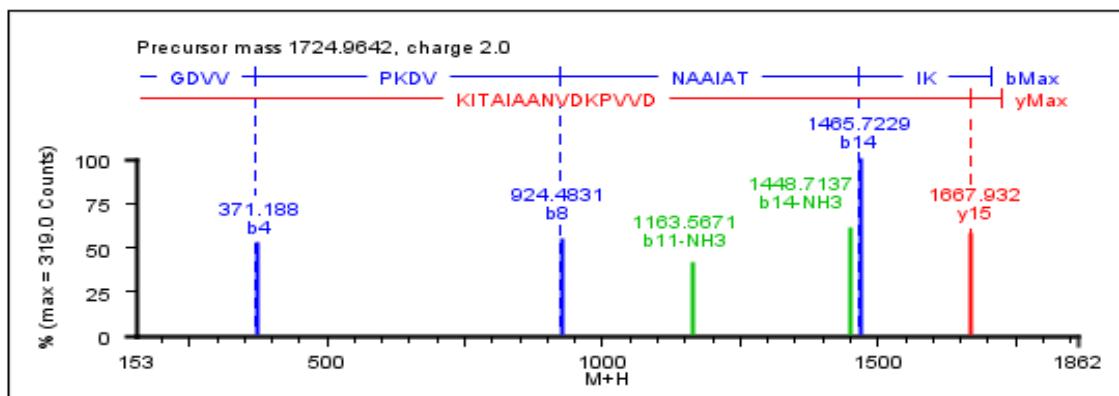
K163

LADQCTGLQGFLVFHSFGGGTGSGFTSLLMERLSVDYG(**Ub**)K

K311

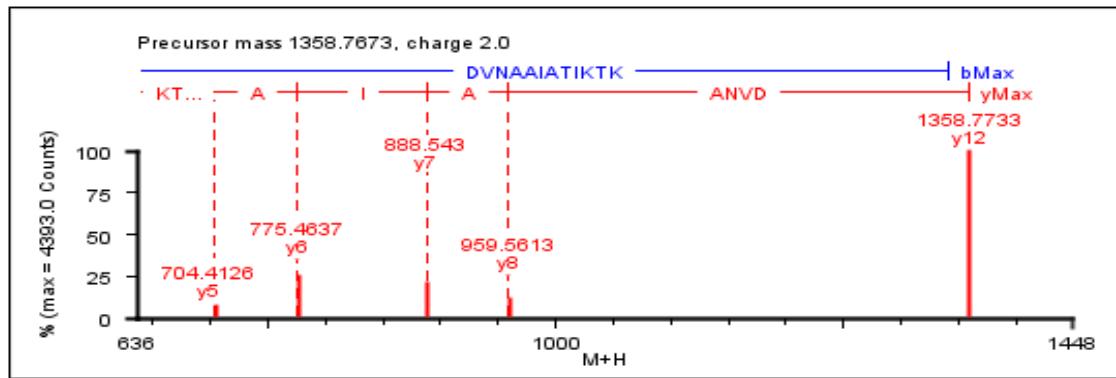
IHFPLATYAPVISAEKAYHEQLSVAEITNACFE PANQMVKCDPRHG(**Ub**)KYMACCLLYR

K326

GDVVPKDVNAAIATI(**Ub**)K

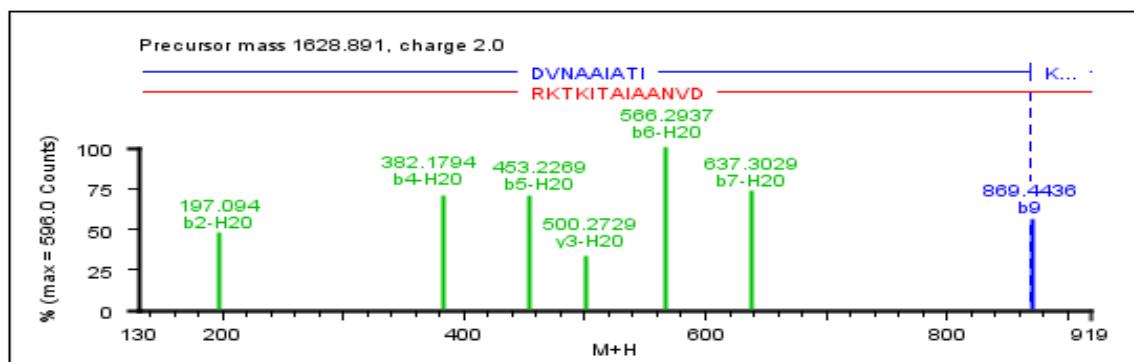
K336

DVNAAIATI(Ub)KTK



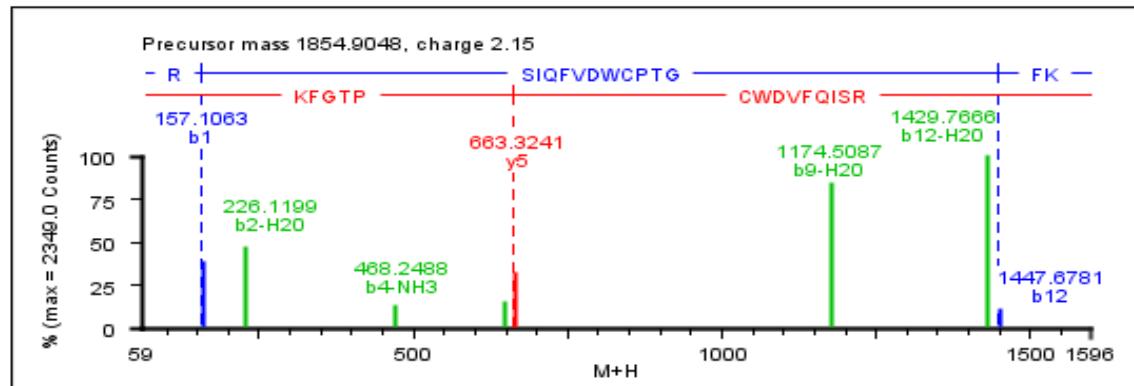
K336, K338

DVNAAIATI(Ub)KT(Ub)KR

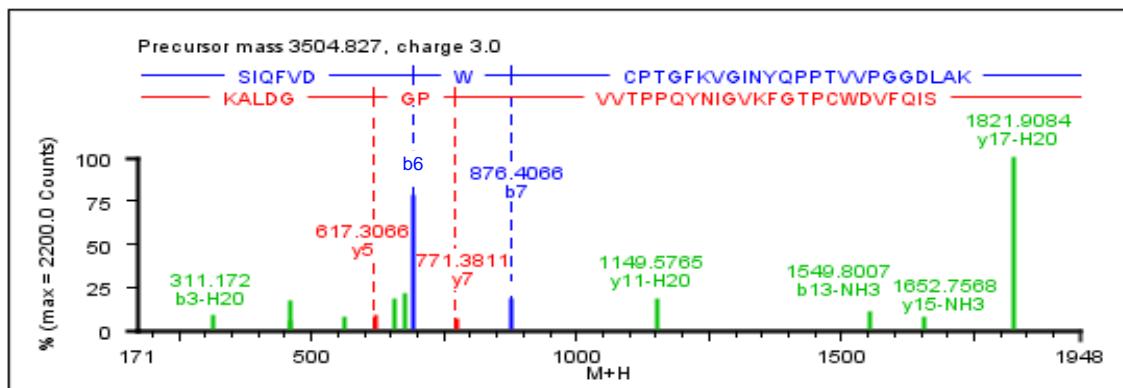


K352

RSIQFVDWCPTGF(Ub)K



K370

SIQFVWCPTGFKVGINYQPPTVVPGGDLA(**Ub**)K

K401

LDHKFDLMYA(**Ub**)K