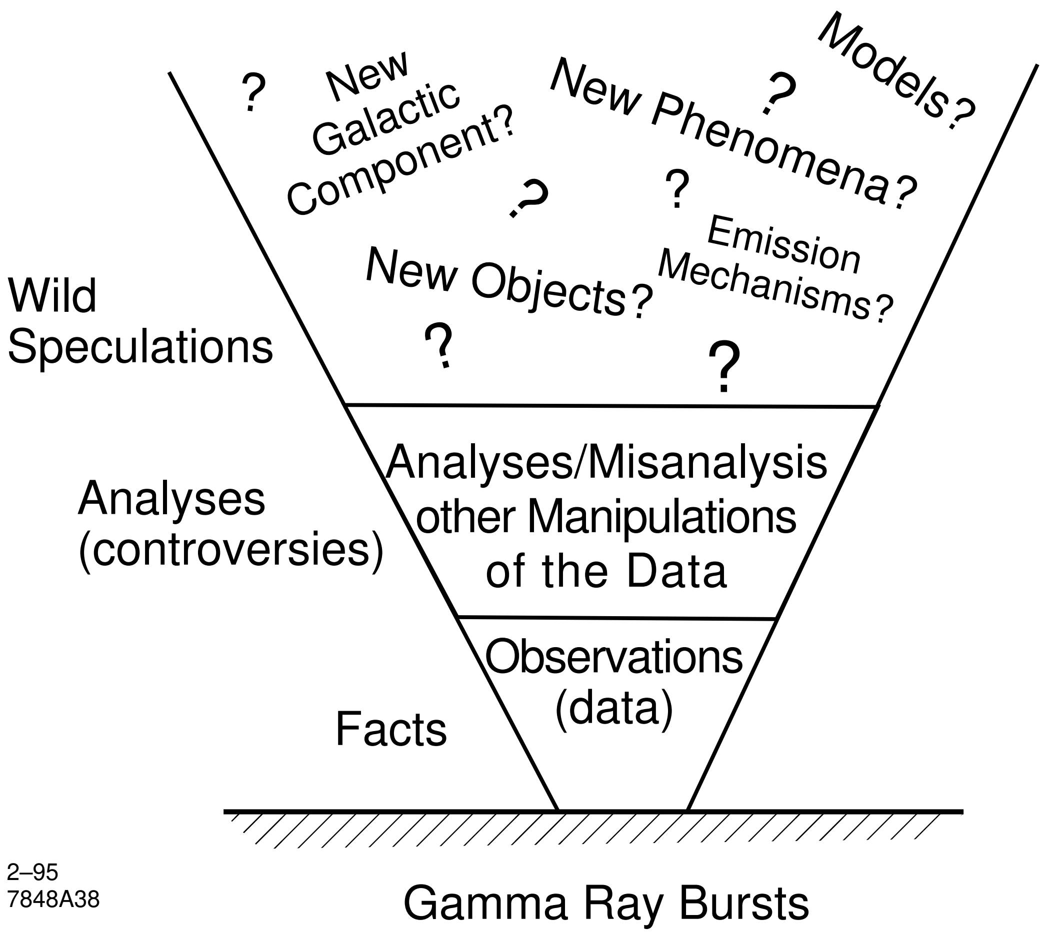
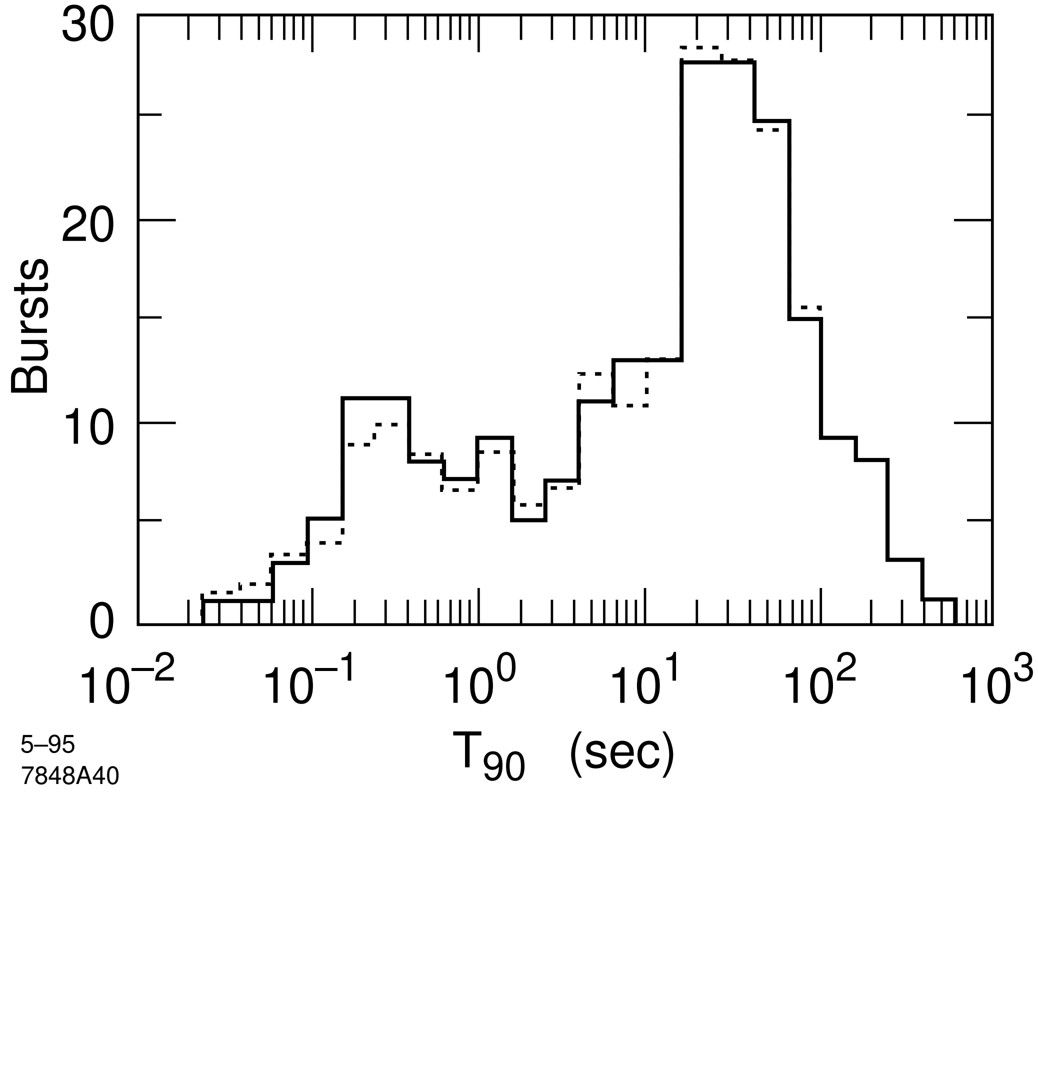
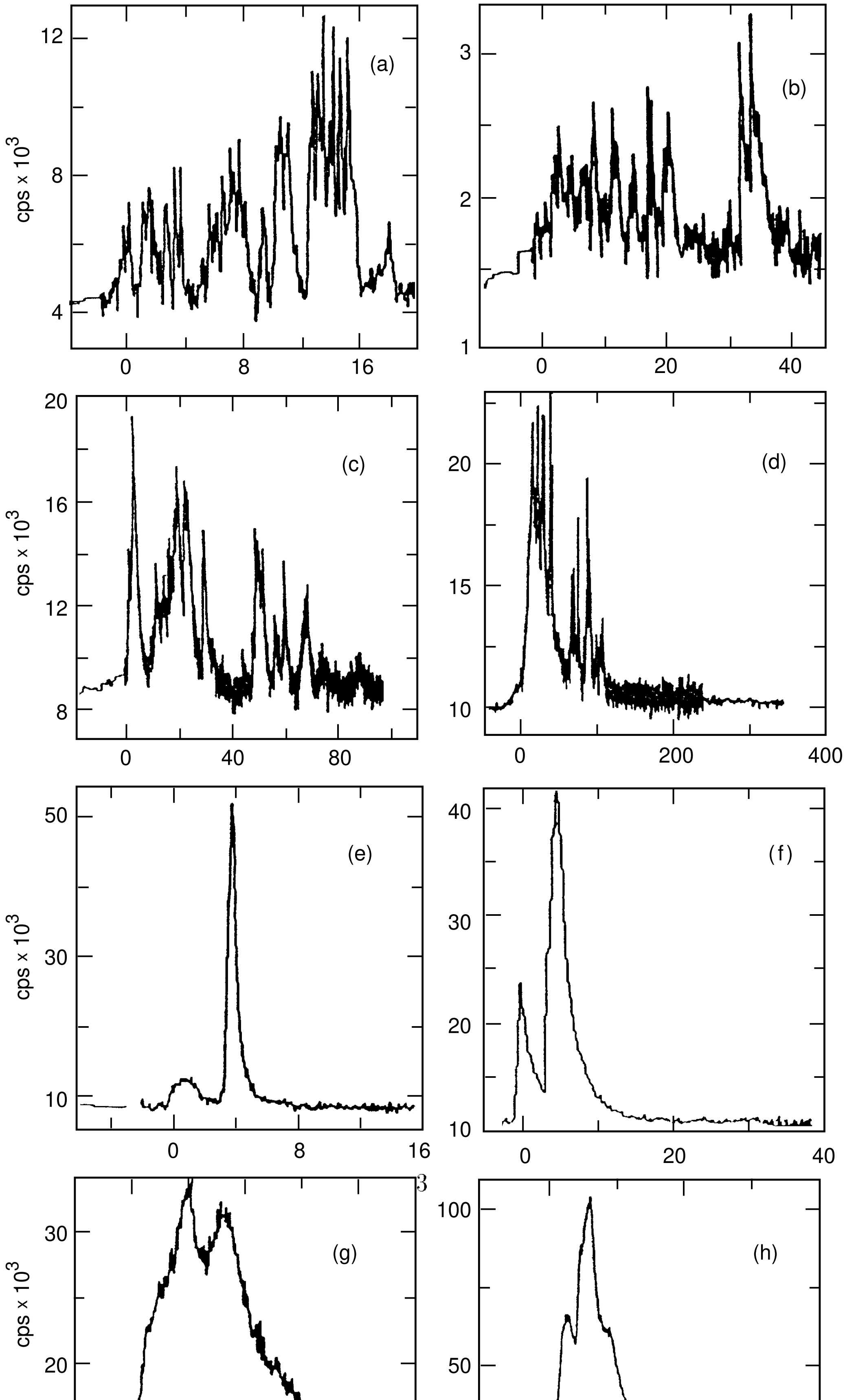
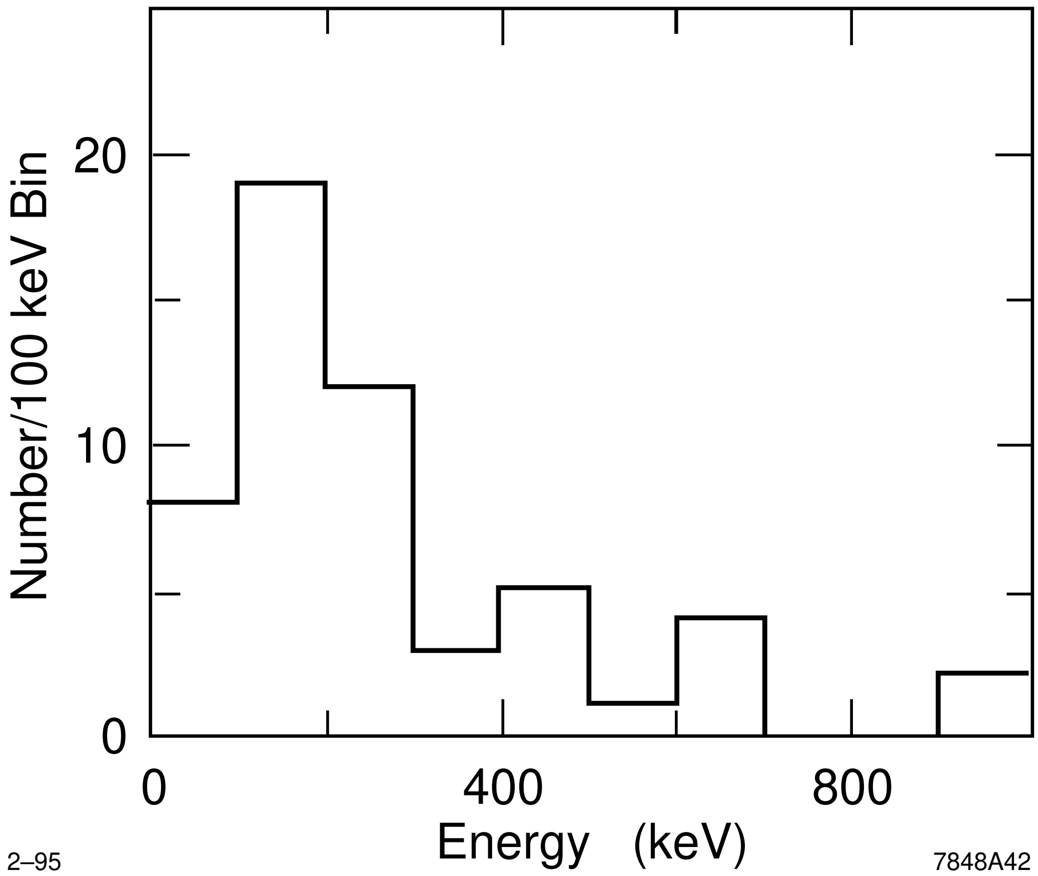
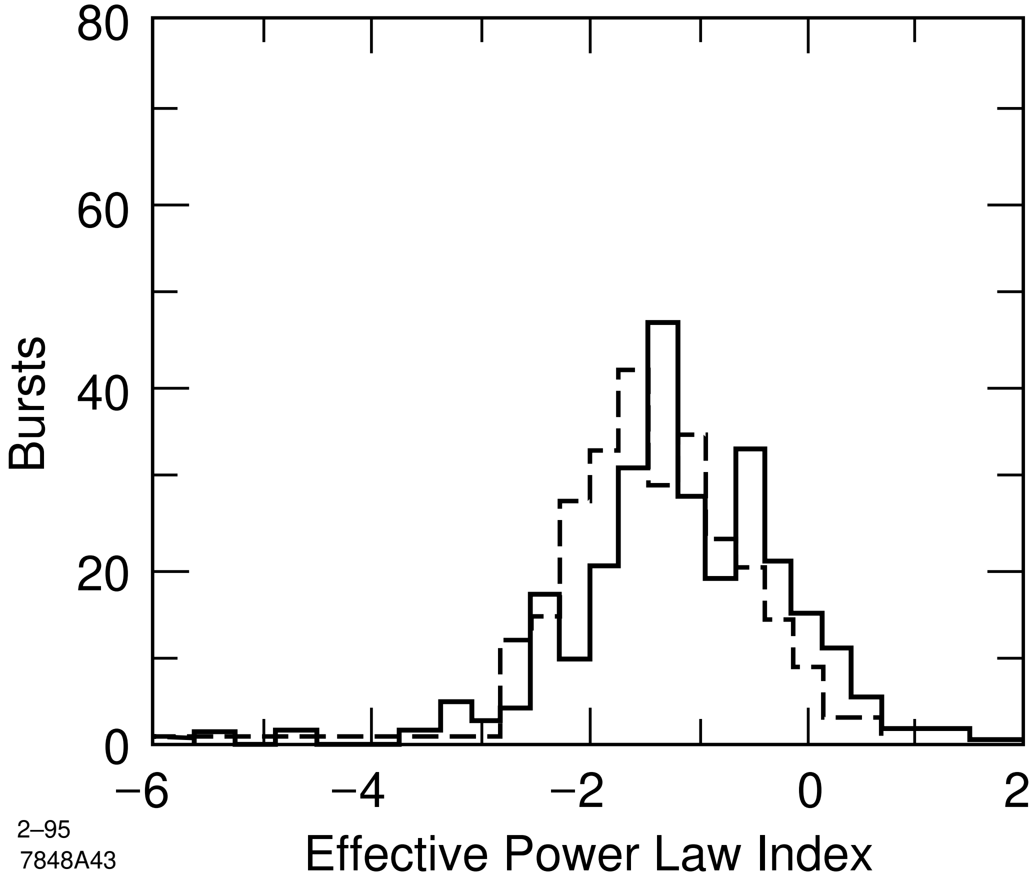
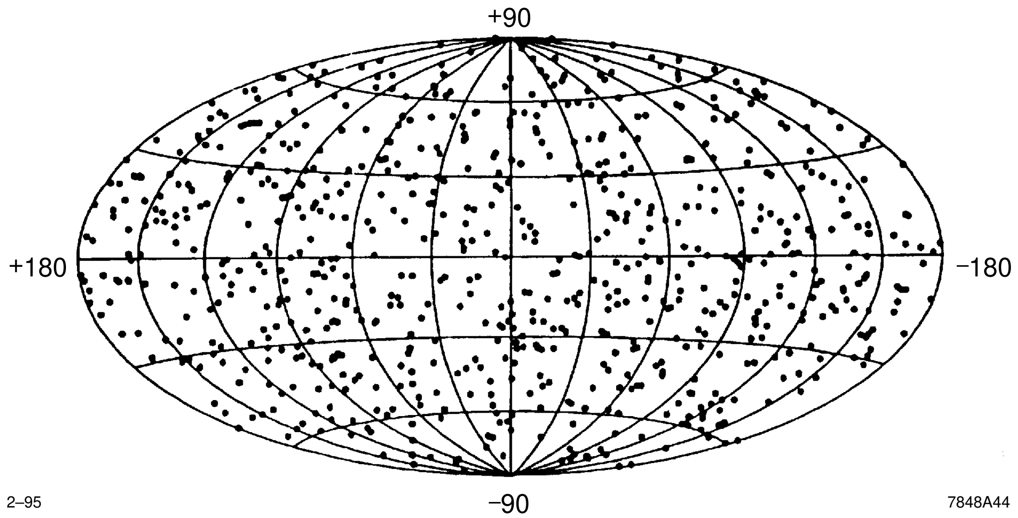

?
New
Galactic
Component?
New Phenomena?
?
Models?
?
?
Emission
Mechanisms?
New Objects?
Wild
Speculations
?
?
Analyses/Misanalysis
other Manipulations
of the Data
Analyses
(controversies)
Observations
(data)
Facts
2–95
7848A38
Gamma Ray Bursts

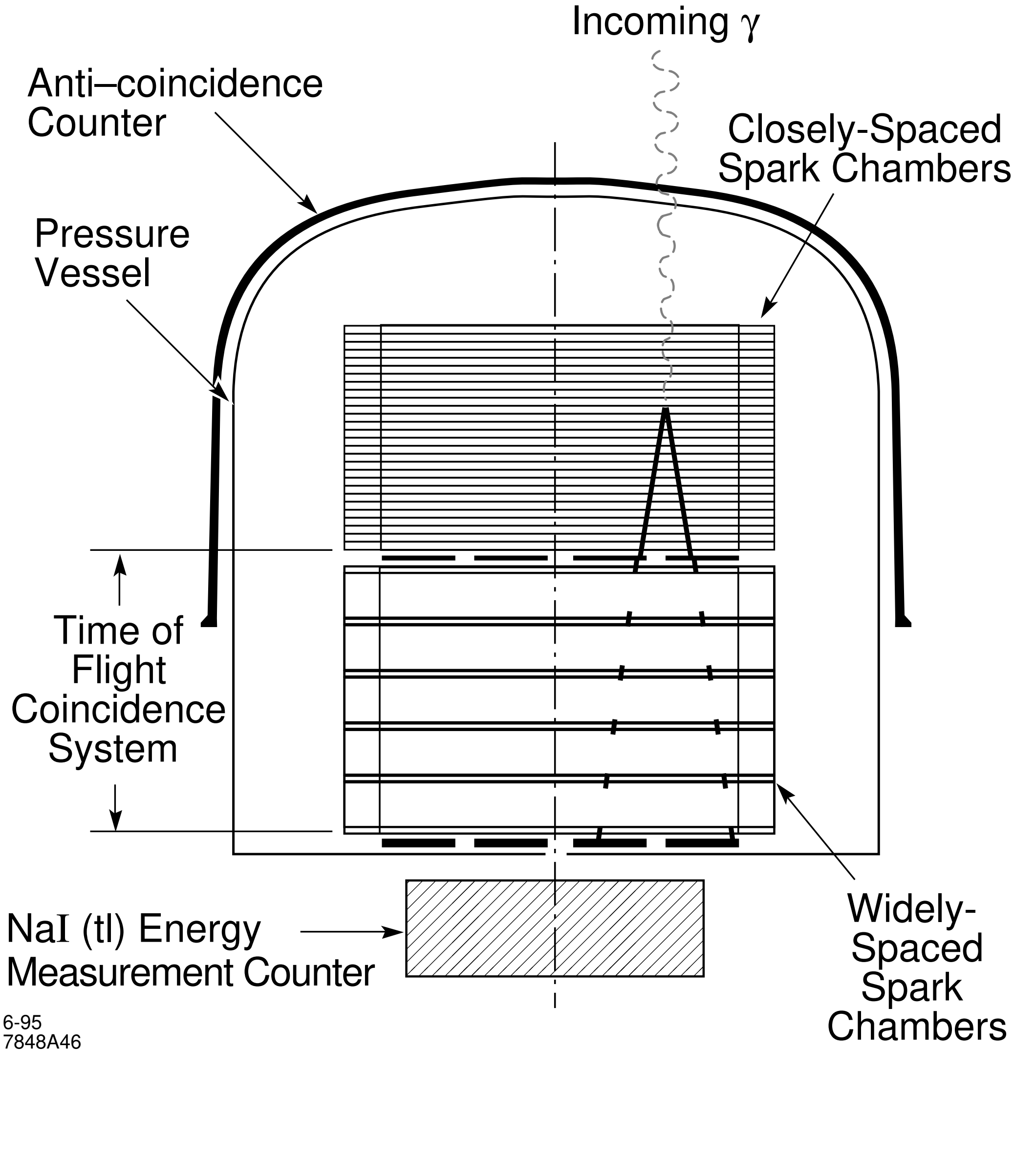

30
20
10
0
Bursts
10^{-2} 10^{-1} 10^{0} 10^{1} 10^{2} 10^{3}
T_{90} (sec)
5–95
7848A40

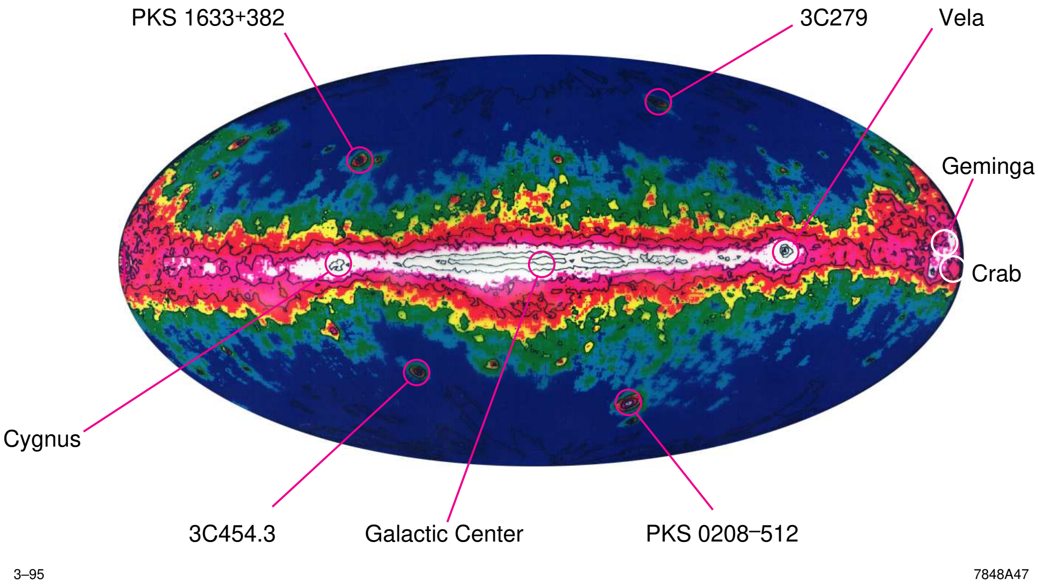

(a)
(b)
(c)
(d)
(e)
(f)
(g)
(h)
cps x 10^3
12
8
4
0
8
16
3
2
1
0
20
40
20
16
12
8
0
40
80
20
15
10
0
200
400
50
30
10
0
8
16
40
30
20
10
0
20
40
30
20
100
50

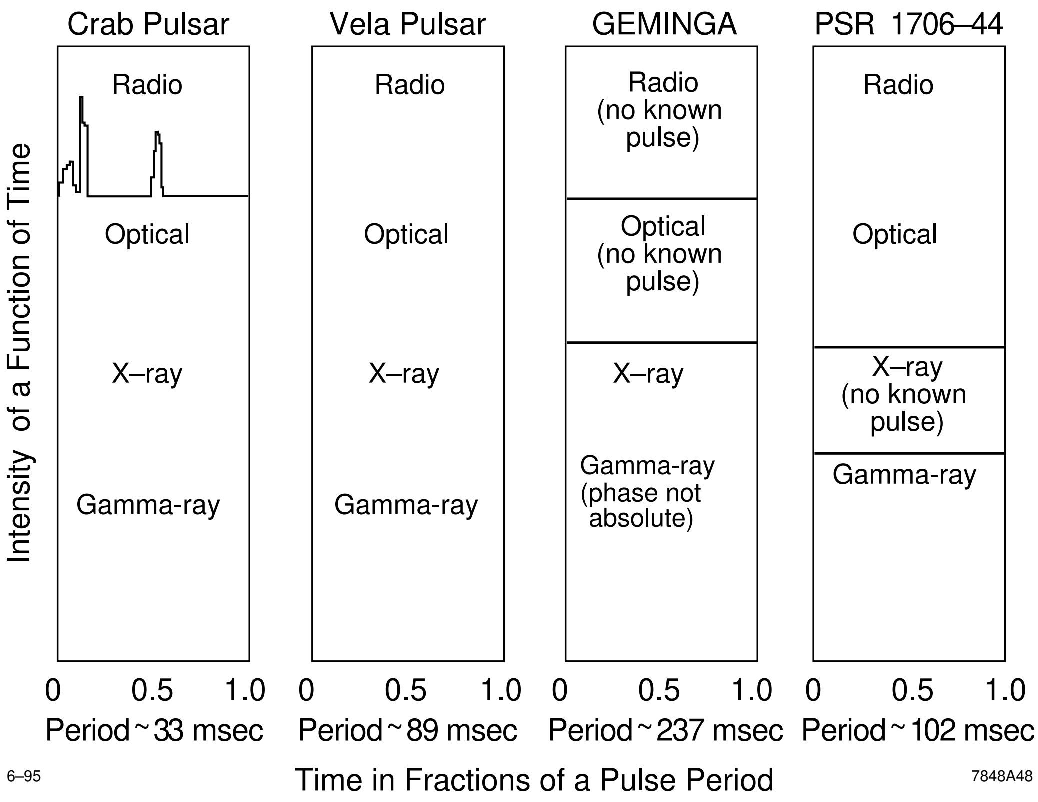

20
10
0
Number/100 keV Bin
0
400
800
Energy (keV)
2–95
7848A42


80
60
40
20
0
Bursts
−6
−4
−2
0
2
Effective Power Law Index
2–95
7848A43

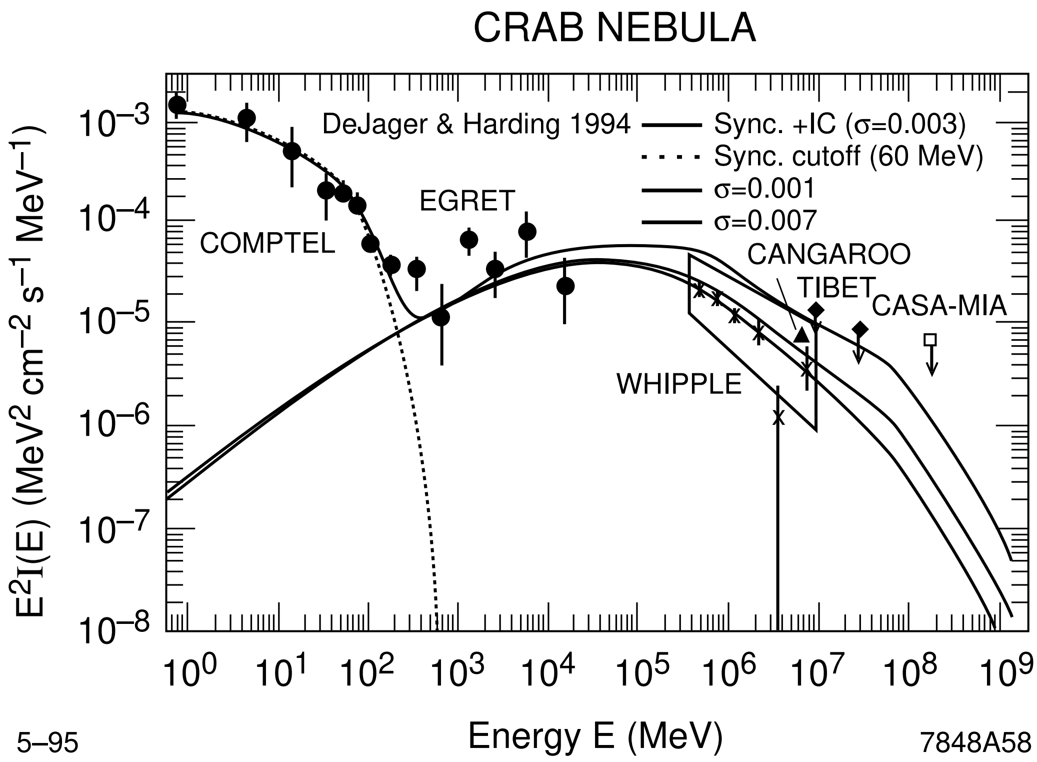

+90
+180
−180
−90
2–95
7848A44


Incoming γ
Anti–coincidence Counter
Closely-Spaced Spark Chambers
Pressure Vessel
Time of Flight Coincidence System
NaI (tl) Energy Measurement Counter
Widely-Spaced Spark Chambers
6-95
7848A46


PKS 1633+382
3C279
Vela
Geminga
Crab
Cygnus
3C454.3
Galactic Center
PKS 0208–512
3–95
7848A47



Crab Pulsar
Vela Pulsar
GEMINGA
PSR 1706–44
Radio
Optical
X–ray
Gamma-ray
Radio
Optical
X–ray
Gamma-ray
Radio
(no known
pulse)
Optical
(no known
pulse)
X–ray
Gamma-ray
(phase not
absolute)
Radio
Optical
X–ray
(no known
pulse)
Gamma-ray
Intensity of a Function of Time
0 0.5 1.0
Period ~ 33 msec
0 0.5 1.0
Period ~ 89 msec
0 0.5 1.0
Period ~ 237 msec
0 0.5 1.0
Period ~ 102 msec
6–95
Time in Fractions of a Pulse Period
7848A48


CRAB NEBULA
DeJager & Harding 1994
Sync. +IC (σ=0.003)
Sync. cutoff (60 MeV)
σ=0.001
σ=0.007
EGRET
COMPTEL
CANGAROO
TIBET
CASA-MIA
WHIPPLE
E²I(E) (MeV² cm⁻² s⁻¹ MeV⁻¹)
Energy E (MeV)
5–95
7848A58