# PS1 StackModelFitSer table fields

The starting point for the PS1 data archive is at Pan-STARRS1 data archive home page.

**Description: Contains the Sersic (1963) fit parameters to extended sources. Only objects with magnitudes brighter than 21.5 outside the Galactic plane have Sersic fits. See StackObjectThin table for discussion of primary, secondary, and best detections. References: Sersic, J. L. 1963, Boletin de la Asociacion Argentina de Astronomia La Plata Argentina, 6, 41.**

| Name | Unit | Data Type | Size | Default Value | Description |
|---|---|---|---|---|---|
| **objID** | dimensionless | BIGINT | 8 | NA | Unique object identifier. |
| **uniquePspsSTid** | dimensionless | BIGINT | 8 | NA | Unique internal PSPS stack identifier. |
| **ippObjID** | dimensionless | BIGINT | 8 | NA | IPP internal object identifier. |
| **randomStackObjID** | dimensionless | FLOAT | 8 | NA | Random value drawn from the interval between zero and one. |
| **primaryDetection** | dimensionless | TINYINT | 1 | 255 | Identifies if this row is the primary stack detection. |
| **bestDetection** | dimensionless | TINYINT | 1 | 255 | Identifies if this row is the best detection. |
| **gippDetectID** | dimensionless | BIGINT | 8 | NA | IPP internal detection identifier. |
| **gstackDetectID** | dimensionless | BIGINT | 8 | NA | Unique stack detection identifier. |
| **gstackImageID** | dimensionless | BIGINT | 8 | NA | Unique stack identifier for g filter detection. |
| **gSerRadius** | arcsec | REAL | 4 | -999 | Sersic (1963) fit radius for g filter stack detection. |
| **gSerRadiusErr** | arcsec | REAL | 4 | -999 | Error in Sersic (1963) fit radius for g filter stack detection. |
| **gSerMag** | AB magnitudes | REAL | 4 | -999 | Sersic (1963) fit magnitude for g filter stack detection. |
| **gSerMagErr** | AB magnitudes | REAL | 4 | -999 | Error in Sersic (1963) fit magnitude for g filter stack detection. |
| **gSerAb** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit axis ratio for g filter stack detection. |
| **gSerAbErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit axis ratio for g filter stack detection. |
| **gSerNu** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit index for g filter stack detection. |
| **gSerNuErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit index for g filter stack detection. |
| **gSerPhi** | degrees | REAL | 4 | -999 | Major axis position angle, phi, of Sersic (1963) fit for g filter stack detection. |
| **gSerPhiErr** | degrees | REAL | 4 | -999 | Error in major axis position angle of Sersic (1963) fit for g filter stack detection. |
| **gSerRa** | degrees | FLOAT | 8 | -999 | Right ascension of Sersic (1963) fit center for g filter stack detection. |
| **gSerDec** | degrees | FLOAT | 8 | -999 | Declination of Sersic (1963) fit center for g filter stack detection. |
| **gSerRaErr** | arcsec | REAL | 4 | -999 | Error in right ascension of Sersic (1963) fit center for g filter stack detection. |
| **gSerDecErr** | arcsec | REAL | 4 | -999 | Error in declination of Sersic (1963) fit center for g filter stack detection. |
| **gSerChisq** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit reduced chi squared for g filter stack detection. |
| **rippDetectID** | dimensionless | BIGINT | 8 | NA | IPP internal detection identifier. |
| **rstackDetectID** | dimensionless | BIGINT | 8 | NA | Unique stack detection identifier. |
| **rstackImageID** | dimensionless | BIGINT | 8 | NA | Unique stack identifier for r filter detection. |
| **rSerRadius** | arcsec | REAL | 4 | -999 | Sersic (1963) fit radius for r filter stack detection. |
| **rSerRadiusErr** | arcsec | REAL | 4 | -999 | Error in Sersic (1963) fit radius for r filter stack detection. |
| **rSerMag** | AB magnitudes | REAL | 4 | -999 | Sersic (1963) fit magnitude for r filter stack detection. |
| **rSerMagErr** | AB magnitudes | REAL | 4 | -999 | Error in Sersic (1963) fit magnitude for r filter stack detection. |
| **rSerAb** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit axis ratio for r filter stack detection. |
| **rSerAbErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit axis ratio for r filter stack detection. |
| **rSerNu** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit index for r filter stack detection. |
| **rSerNuErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit index for r filter stack detection. |
| **rSerPhi** | degrees | REAL | 4 | -999 | Major axis position angle, phi, of Sersic (1963) fit for r filter stack detection. |
| **rSerPhiErr** | degrees | REAL | 4 | -999 | Error in major axis position angle of Sersic (1963) fit for r filter stack detection. |
| **rSerRa** | degrees | FLOAT | 8 | -999 | Right ascension of Sersic (1963) fit center for r filter stack detection. |

| | | | | | |
|---|---|---|---|---|---|
| **rSerDec** | degrees | FLOAT | 8 | -999 | Declination of Sersic (1963) fit center for r filter stack detection. |
| **rSerRaErr** | arcsec | REAL | 4 | -999 | Error in right ascension of Sersic (1963) fit center for r filter stack detection. |
| **rSerDecErr** | arcsec | REAL | 4 | -999 | Error in declination of Sersic (1963) fit center for r filter stack detection. |
| **rSerChisq** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit reduced chi squared for r filter stack detection. |
| **iippDetectID** | dimensionless | BIGINT | 8 | NA | IPP internal detection identifier. |
| **istackDetectID** | dimensionless | BIGINT | 8 | NA | Unique stack detection identifier. |
| **istackImageID** | dimensionless | BIGINT | 8 | NA | Unique stack identifier for i filter detection. |
| **iSerRadius** | arcsec | REAL | 4 | -999 | Sersic (1963) fit radius for i filter stack detection. |
| **iSerRadiusErr** | arcsec | REAL | 4 | -999 | Error in Sersic (1963) fit radius for i filter stack detection. |
| **iSerMag** | AB magnitudes | REAL | 4 | -999 | Sersic (1963) fit magnitude for i filter stack detection. |
| **iSerMagErr** | AB magnitudes | REAL | 4 | -999 | Error in Sersic (1963) fit magnitude for i filter stack detection. |
| **iSerAb** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit axis ratio for i filter stack detection. |
| **iSerAbErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit axis ratio for i filter stack detection. |
| **iSerNu** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit index for i filter stack detection. |
| **iSerNuErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit index for i filter stack detection. |
| **iSerPhi** | degrees | REAL | 4 | -999 | Major axis position angle, phi, of Sersic (1963) fit for i filter stack detection. |
| **iSerPhiErr** | degrees | REAL | 4 | -999 | Error in major axis position angle of Sersic (1963) fit for i filter stack detection. |
| **iSerRa** | degrees | FLOAT | 8 | -999 | Right ascension of Sersic (1963) fit center for i filter stack detection. |
| **iSerDec** | degrees | FLOAT | 8 | -999 | Declination of Sersic (1963) fit center for i filter stack detection. |
| **iSerRaErr** | arcsec | REAL | 4 | -999 | Error in right ascension of Sersic (1963) fit center for i filter stack detection. |
| **iSerDecErr** | arcsec | REAL | 4 | -999 | Error in declination of Sersic (1963) fit center for i filter stack detection. |
| **iSerChisq** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit reduced chi squared for i filter stack detection. |
| **zippDetectID** | dimensionless | BIGINT | 8 | NA | IPP internal detection identifier. |
| **zstackDetectID** | dimensionless | BIGINT | 8 | NA | Unique stack detection identifier. |
| **zstackImageID** | dimensionless | BIGINT | 8 | NA | Unique stack identifier for z filter detection. |
| **zSerRadius** | arcsec | REAL | 4 | -999 | Sersic (1963) fit radius for z filter stack detection. |
| **zSerRadiusErr** | arcsec | REAL | 4 | -999 | Error in Sersic (1963) fit radius for z filter stack detection. |
| **zSerMag** | AB magnitudes | REAL | 4 | -999 | Sersic (1963) fit magnitude for z filter stack detection. |
| **zSerMagErr** | AB magnitudes | REAL | 4 | -999 | Error in Sersic (1963) fit magnitude for z filter stack detection. |
| **zSerAb** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit axis ratio for z filter stack detection. |
| **zSerAbErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit axis ratio for z filter stack detection. |
| **zSerNu** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit index for z filter stack detection. |
| **zSerNuErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit index for z filter stack detection. |
| **zSerPhi** | degrees | REAL | 4 | -999 | Major axis position angle, phi, of Sersic (1963) fit for z filter stack detection. |
| **zSerPhiErr** | degrees | REAL | 4 | -999 | Error in major axis position angle of Sersic (1963) fit for z filter stack detection. |
| **zSerRa** | degrees | FLOAT | 8 | -999 | Right ascension of Sersic (1963) fit center for z filter stack detection. |
| **zSerDec** | degrees | FLOAT | 8 | -999 | Declination of Sersic (1963) fit center for z filter stack detection. |
| **zSerRaErr** | arcsec | REAL | 4 | -999 | Error in right ascension of Sersic (1963) fit center for z filter stack detection. |
| **zSerDecErr** | arcsec | REAL | 4 | -999 | Error in declination of Sersic (1963) fit center for z filter stack detection. |
| **zSerChisq** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit reduced chi squared for z filter stack detection. |
| **yippDetectID** | dimensionless | BIGINT | 8 | NA | IPP internal detection identifier. |
| **ystackDetectID** | dimensionless | BIGINT | 8 | NA | Unique stack detection identifier. |
| **ystackImageID** | dimensionless | BIGINT | 8 | NA | Unique stack identifier for y filter detection. |
| **ySerRadius** | arcsec | REAL | 4 | -999 | Sersic (1963) fit radius for y filter stack detection. |
| **ySerRadiusErr** | arcsec | REAL | 4 | -999 | Error in Sersic (1963) fit radius for y filter stack detection. |
| **ySerMag** | AB magnitudes | REAL | 4 | -999 | Sersic (1963) fit magnitude for y filter stack detection. |

| | | | | | |
|---|---|---|---|---|---|
| **ySerMagErr** | AB magnitudes | REAL | 4 | -999 | Error in Sersic (1963) fit magnitude for y filter stack detection. |
| **ySerAb** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit axis ratio for y filter stack detection. |
| **ySerAbErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit axis ratio for y filter stack detection. |
| **ySerNu** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit index for y filter stack detection. |
| **ySerNuErr** | dimensionless | REAL | 4 | -999 | Error in Sersic (1963) fit index for y filter stack detection. |
| **ySerPhi** | degrees | REAL | 4 | -999 | Major axis position angle, phi, of Sersic (1963) fit for y filter stack detection. |
| **ySerPhiErr** | degrees | REAL | 4 | -999 | Error in major axis position angle of Sersic (1963) fit for y filter stack detection. |
| **ySerRa** | degrees | FLOAT | 8 | -999 | Right ascension of Sersic (1963) fit center for y filter stack detection. |
| **ySerDec** | degrees | FLOAT | 8 | -999 | Declination of Sersic (1963) fit center for y filter stack detection. |
| **ySerRaErr** | arcsec | REAL | 4 | -999 | Error in right ascension of Sersic (1963) fit center for y filter stack detection. |
| **ySerDecErr** | arcsec | REAL | 4 | -999 | Error in declination of Sersic (1963) fit center for y filter stack detection. |
| **ySerChisq** | dimensionless | REAL | 4 | -999 | Sersic (1963) fit reduced chi squared for y filter stack detection. |