

Days	Name	Durations	Category	Main Categories
1	Why Python in Bioinformatics	9:16	Introduction	Python
1	Introduction to Python and it's Intallation	8:25	Introduction	Python
2	Comments	5:42	Introduction	Python
2	Basic Input and output	15:37	Introduction	Python
3	Mathematical Operations	7:20	Introduction	Python
3	Strings	21:51	Iterable Objects	Python
4	Dictionaries	10:57	Iterable Objects	Python
4	Lists	28:47:00	Iterable Objects	Python
5	Tuples	10:37:00	Iterable Objects	Python
5	Sets	7:35	Iterable Objects	Python
6	If-Else	9:19	Control Flow	Python
6	For Loop and Calculation of Molecular Weight of Proteins	10:56	Control Flow	Python
7	While Loop and Biological Data Analysis	9:37	Control Flow	Python
7	Reading Files	13:45	File Handling	Python
8	Writing Files	8:41	File Handling	Python
8	Consolidate(merge) multiple DNA and Protein Sequences into one FASTA file	7:17	File Handling	Python
9	OS	9:24	File Handling	Python
9	CSV (A special kind of file in Bioinformatics)	31:47:00	File Handling	Python
10	Functions	26:41:00	Functions & Modules	Python
10	With	8:50	Functions & Modules	Python
11	Error Handling	15:31	Error Handling	Python
11	Introduction to BioPython & Installation	10:18	Introduction	BioPython
12	Bio.Seq Create a Seq Object	7:38	Sequence Analysis	BioPython
12	Bio.Seq Seq Object Behaves Like a String	9:54	Sequence Analysis	BioPython

13	Bio.Seq Central Dogma in Play Through Python	8:41	Sequence Analysis	BioPython
13	Bio.Seq Unkown & Mutable Sequences	6:53	Sequence Analysis	BioPython
14	Bio.Alphabet Understanding the Alphabets of Biology	7:37	Sequence Analysis	BioPython
14	Bio.Alphabet IUPAC and Types of Sequence Representations	10:34	Sequence Analysis	BioPython
15	Bio.Alphabet Concatenation of Multiple Seq Records Using Generic Alphabets	9:47	Sequence Analysis	BioPython
15	SeqRecord Creating Seq Records	12:27	Sequence Analysis	BioPython
16	SeqRecords & FASTA	4:35	Sequence Analysis	BioPython
16	SeqRecords & GenBank	3:28	Sequence Analysis	BioPython
17	SeqRecord Formatting Records	3:47	Sequence Analysis	BioPython
17	SeqRecord Comparison & Reading Multiple FASTA Files from Directory	5:47	Sequence Analysis	BioPython
18	SeqIO Reading a Sequence File	10:32	Sequence Data Parsing	BioPython
18	SeqIO Parsing a Sequence File	7:16	Sequence Data Parsing	BioPython
19	SeqIO Parsing a Compressed Sequence File & Creating a Dictionary of Sequences	6:10	Sequence Data Parsing	BioPython
19	SeqIO - Write Sequences and SeqRecords Into Files	11:42	Sequence Data Parsing	BioPython
20	SeqIO Extracting Annotations and Pattern-wise Sequence Data Extraction	10:35	Sequence Data Extraction	BioPython
20	AlignIO - Reading and Parsing a Multiple Sequence Alignment File	8:19	Alignment Parsing and Analysis	BioPython
21	AlignIO - Writing Alignments and Multiple Sequence Alignment Records	5:28	Alignment Parsing and Analysis	BioPython
21	AlignIO - Conversion of Alignment Formats	4:01	Alignment Parsing and Analysis	BioPython
22	AlignIO - Manipulating Alignments	2:57	Alignment Parsing and Analysis	BioPython

22	AlignIO - ClustalW Python Wrapper - Align Multiple Sequences	7:47	Alignment Parsing and Analysis	BioPython
23	AlignIO - Pairwise2 - Align Two Sequences	7:31	Alignment Parsing and Analysis	BioPython
23	AlignIO - Information Mapping of Alignments	2:33	Alignment Parsing and Analysis	BioPython
24	AlignIO - Format Alignments	3:55	Alignment Parsing and Analysis	BioPython
24	AlignIO - Slicing Alignments	6:05	Alignment Parsing and Analysis	BioPython
25	Bio.Blast - Querying NCBI BLAST Through Python	11:41	BLAST Database Searching	BioPython
25	Bio.Blast - Parsing BLAST Results	14:51	Parsing BLAST results	BioPython
26	Bio.Entrez - Accessing ENTREZ Using Python	9:32	Biological Data Retrieval	BioPython
26	Bio Entrez Use Esummary To Get Summary Of Your Accessions	8:59	Biological Data Retrieval	BioPython
27	Bio.Entrez - Use EFetch to Download Complete Records	13:56	Biological Data Retrieval	BioPython
27	Bio.Entrez - Use EGQuery to Do Global Queries for Search Counts	7:24	Biological Data Retrieval	BioPython
28	Bio.Entrez - Use Elink To Search For Database Links Of Records	3:41	Biological Data Retrieval	BioPython
28	Bio.Entrez - Use ESearch to Search the Entrez Databases	8:20	Biological Data Retrieval	BioPython
29	Bio.Entrez - Use Espell To Get Correct Spellings For Your Search Terms	5:21	Biological Data Retrieval	BioPython
29	Bio.Entrez - Download GenBank and Entrez Records	14:17	Biological Data Retrieval	BioPython
30	Bio.Entrez - Taxonomy Database Searching	7:05	Biological Data Retrieval	BioPython
30	Bio.Entrez - Download PubMed Articles	8:28	Biological Data Retrieval	BioPython

31	Bio.Entrez - Use EFetch to Download Complete Records	13:56	Biological Data Retrieval	BioPython
31	Bio.PDB - Reading a PDB (3D Structure) File	11:59	Parsing a PDB Structure file	BioPython
32	Bio.Phylo - Calculating Distance Matrix Between Sequences For Phylogenetic Analysis	4:18	Phylogenetic Analysis	BioPython
32	Bio.Phylo - Converting Phylogenetic Tree Data Formats	3:28	Phylogenetic Analysis	BioPython
33	Bio.Phylo - Printing Out Phylogenetic Tree In Ascii	2:17	Phylogenetic Analysis	BioPython
33	Bio.Phylo - Reading Phylogenetic Trees	6:28	Phylogenetic Analysis	BioPython
34	Bio.Phylo - Visualization And Manipulation Of Phylogenetic Trees	9:36	Phylogenetic Analysis	BioPython
34	Bio.Phylo - Writing Out Phylogenetic Data	4:04	Phylogenetic Analysis	BioPython
35	Bio.motifs - Creating a WebLogo of Motifs		Protein Sequence Analysis	BioPython
35	Bio.motifs - MEME Analysis		Protein Sequence Analysis	BioPython