

BAB 5

KESIMPULAN DAN SARAN

5.1. Kesimpulan

Perguruan Tinggi Swasta A (PTS A) dalam memberikan beasiswa terhadap calon mahasiswa baru jenjang S1 melalui "Program Penelusuran Minat Dan Kemampuan atau dikenal dengan "Jalur PMDK" dapat dimodelkan menggunakan pembelajaran mesin dan memanfaatkan *data mining*. Diantara beberapa model yang digunakan seperti *Logistic Regression* (LR), *Decision Tree* (DT), *Naïve Bayes* (NB), *K Nearest Neighbor* (KNN), *Support Vector Machine* (SVM), *Artificial Neural Network* (ANN), maka model *Logistic Regression* (LR) menjadi model yang memiliki akurasi terbaik terhadap data uji yaitu sebesar 62,29% dibandingkan dengan model-model lainnya.

5.2. Saran

Penambahan atribut dan kelengkapan data dari setiap atributnya menjadi salah satu pertimbangan jika pengembangan model prediksi di PTS A hendak ditindak lanjuti untuk meningkatkan nilai akurasi model. Beberapa contoh penambahan atribut:

1. Atribut besaran beasiswa yang ditawarkan oleh PTS A terhadap lolosnya calon mahasiswa baru dari proses seleksi melalui jalur PMDK yang sebelumnya tidak ada, maka perlu dicatat dan disertakan dalam pembuatan model sehingga tingkat akurasi model dapat menjadi lebih baik.

2. Atribut Agama dari calon mahasiswa juga diestimasikan dapat membuat akurasi model menjadi lebih baik.
3. Atribut penghasilan orang tua. Atribut ini mewakili latar belakang kemampuan finansial dari keluarga.
4. Atribut nilai sumbangan yang akan diberikan dari calon mahasiswa.
5. Atribut apakah calon mahasiswa memiliki saudara kandung yang sedang berkuliah maupun alumni dari PTS A. Atribut ini dapat menjadi indikator hubungan kedekatan PTS A dengan calon mahasiswa .

Pengembangkan model prediksi selain jalur PMDK juga terbuka luas untuk dilakukan penelitian, mengingat adanya perbedaan pola dan karakter disetiap jalur pendaftaran. Penelitian model prediksi yang dapat mengakomodasi untuk setiap jalur pendaftarannya diharapkan secara keseluruhan dapat mengetahui faktor utama yang mempengaruhi model dan pada akhirnya dapat meningkatkan penerimaan jumlah mahasiswa baru jenjang sarjana di PTS A.



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